SOUTHERN UTOMOTIVE OURNAL

PASS IT ONI	
OWNER	
GEN. MGR.	
SERV. MGR.	
PARTS MGR.	
FOREMAN	
SHOP	
September,	1951



Perfect Circle's 2-in-1 chrome piston ring set assures positive oil control

without shaving the cylinder walls on each stroke! Solid chrome plating, applied to BOTH top compression rings and the steel rails of the Oil Stopper, gives the 2-in-1 Chrome Set more than twice the life of ordinary sets . . . yet does not scuff and score cylinder walls! What's more, the 2-in-1 Chrome Set is actually two sets in one-

because two expander springs are included with every Chrome Oil Stopper, giving mechanics a choice of spring pressures for every installation. For rebored, resleeved and slightly worn engines, you'll choose the Normal Pressure spring-for known oil pumpers, the HiPressure spring.

in EVERY engine, you'll get maximum performance, with sustained power, whether cylinders are tapered or straight, round or out-of-round! See your Perfect Circle Representative, or write the Perfect Circle Corporation, Hagerstown 3, Indiana for complete



NORMAL PRESSURE SPRING for rebored, resleeved and slightly warn engines. Spring-ends



HIPRESSURE SPRING for badly worn engines and known oil pumpers. Spring-ends are notched.

Perfect Circle

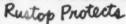
The Standard of Comparison

PLATED WITH SOLID CHROME



Here's the ABCOFITS for YOU...

WHIZ COOLING SYSTEM PRODUCTS!



Both a rust preventive and waterpump lubricant! A soluble oil-type product with extremely effective anti-rust properties. Excellent lubricant for sealed waterpump systems.





Kleen-Flush Cleans

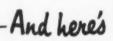
Powerful acid-type cleaner dissolves rust, scale, sludge and cerrosion. No reverse flushing needed. Conditioner neutralizes acidic action.



Instant Scaler Seals

Seeps into all places where leaks occur, and seals leaks solidly even after water is drained out. Will not clog or harm cooling system in any. way.

Your WHIZ jobber has the new special deal in stock—ask him for yours today! If he cannot supply WHIZ products, ask him to stock them for you—or write direct.





for DEAL!

SPECIAL BONUS DEAL NO. 51-R

Featuring Sessions "Kitty-Belle" Electric Alarm Clock. Sleeps you more quietly, with not even a pu-r-r. Wakes you more cheerfully, with Tru-Bel Alarm—insistent, yet pleasant and gentle. A finer quality, quiet electric clock for use anywhere in the house. Beautifully finished in gleaming white, damage resistant plastic. 4' wide, 3%' high with 3%' dial.

YOU BUY: 1 case (24 cans) Rustop	
1 case Kleen-Flush	
1 case Instant Sealer	9.36
OR: Equivalent dollar value of any WHIZ Cooling System product.	Plus
YOUR BONUS: "Kirty-Belle" Electric Clock	4.95 Tex

Regular Dealer Price \$37.71
Your Special Price Only \$32.76







SOUTHERN AUTOMOTIVE JOURNAL is Subscription rates, United States Entered as second cla

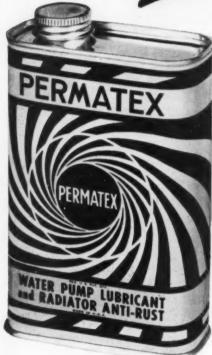
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Volume 31

Number 9

WATER PUMP

Lubricant



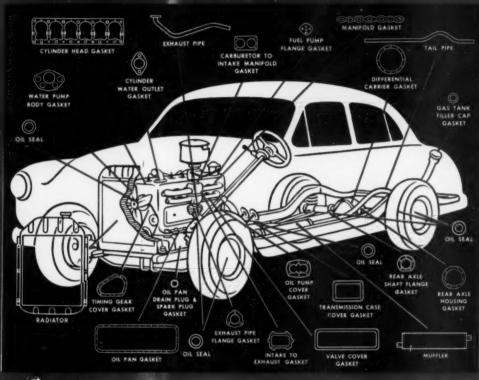
COOLING SYSTEM
Service
Service
...LUBRICATES
...PREVENTS RUST

Takes squeals out of water pumps and clarifies water in cooling systems. It contains a Soluble Oil that lubricates all water pump parts and coagulates rust. Harmless to metals and rubber hose. Works perfectly in the presence of any standard anti-freeze.

PERMATEX COMPANY, INC., BROOKLYN 35, N. Y.

MCCORD Products

or SUPERIOR QUALITY Replacements



The name McCord on a gasket, radiator, muffler, or oil seal is your assurance of a quality product that has been Individually Engineered to give equal or better service than the part replaced. McCord replacement products are distributed by over two thousand automotive jobbers

throughout the world. This distribution means that McCord gaskets, radiators, mufflers, and oil seals are always available and near at hand.

Specify "McCord," stock and have on hand McCord products. Then you are following the example of good service men everywhere.

You Can Depend on MCCORD Products . .

GASKETS, MUFFLERS PIPES. RADIATORS OIL SEALS

Most Service Men Dol



ONLY CASITE MAKES THIS Double-Your-Money-Back OFFER

BETTER AND SMOOTHER PERFORMANCE ALL YEAR AROUND—QUICK STARTING IN COLDEST WEATHER OR DOUBLE-YOUR-MONEY-BACK!

 There's no guesswork, no gambling, with Casite—your customer gets Better and Smoother Performance all the time—or he gets back twice what he paid.

This is just one more reason why Casite sells fast—and repeatedly. Casite can make this amazing guarantee because it gets rid of engine gum and goo... frees sticky valves and rings... lets the power zoom through. Con-

tinued use of Casite keeps the engine clean, keen, free-running.

Casite also cuts engine wear, by improving lubrication. Casite speeds oil, spreads oil, helps it penetrate. Actually, it speeds the flow of No. 20 oil at 50° F.—and as the engine warms up, oil returns to normal-range viscosity. Casite gets enough oil to the right places at the right time for long and economical engine life.

Display Casite. Push Casite. Talk Casite with every customer—for guaranteed Better and Smoother Performance and Quick Starting in Coldest Weather.

CASITE DIVISION, HASTINGS MANUFACTURING CO., HASTINGS, MICHIGAN

CASITE . DROUT . PISTON RINGS . SPARK PLUGS . OIL FILTERS







"Original factory parts assure me repeat business"

"Anyone who claims the bigger margin of substitute parts is all extra profit is talking through his hat. Your substitute part takes more selling to start with and requires more 'make good' and extra service time. In my book the so-called big margin is quickly eaten up and you are left behind the 8-ball with a dissatisfied customer. That's why I stick with Original Factory Parts that carry a profitable margin and assure me repeat business and a healthy growing volume."

E. B. Snyder, 234-6 Commerce Place, Greensboro, N.C. The outstanding customer satisfaction Auto-Lite Original Factory Parts afford service men is proved by this fact: more than half of America's car makers specify Auto-Lite. Make the wise choice of original factory parts and protect your honest workmanship... and build your reputation and your business. For full information, write to

THE ELECTRIC AUTO-LITE COMPANY

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Tested Quality HELPS YOU DELIVER

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ORIGINAL

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SERVICE PARTS

TUNE IN "SUSPENSE!" . . . CBS RADIO MONDAYS . . . CBS TELEVISION TUESDAYS



IT MEANS EXTRA VALUE FOR CUSTOMERS— EXTRA PROFITS FOR YOU!

These two great Bendix Eclipse products are real money makers. Why? Because when you tell a customer about the extra smooth, extra safe stops and mile after mile of extra road life in every set, he's bound to be enthusiastic. A quick sale is easy because you are giving him just what he has been looking for. So, get in touch with your jobber and stock up on Bendix Eclipse Brake Linings and Blocks today. Give them a try and you'll agree—Benium gives you the edge that cuts down sales resistance every time

Eclipse

BRAKE LININGS and BLOCKS

PRODUCTS OF **Bendix**Greatest Name in Braking!

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TROY, NEW YORK

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Everyone...yes

eryone will buy

accessories this fall!



NEST MADE! INNER CONTROLLED! worful sociad-boom light turns in a aplete circle. Smart, streamlined design

LIST STF.SD

CASCO GLASS WINDSHIELD DEFROSTER

SAFII SUREI PROFITABLEI Exclusive Switch Control plug provides positive "on end off" heet-control. Defroster, 8" x 16", works wonders in sleet, ice, seew and log.

No. A-18 fee 12 Vet Systems LET 54.00

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CASCO 2-SPEED 6" RUBBER-BLADED AUTO FAN

QUIETI DEPENDABLE! Funs have chrome ploted metal trim and swive arm. Motor case is die-cast, has universal mounting brackets for

CASCO HUB REPLACEMENT ASSEMBLY

TREMENDOUS NEW MARKET EVERY DAY. Wore out fans of every make are replaced daily with the reliable CASCO Hub Assembly, Merchandising package includes 6 Hub Assemblies — each 3 mounted on display card.

10. P-14 EIST 32.00

CONSISTENT NATIONAL ADVERTISING

in great mass magazines like the Saturday Evening Post, makes CASCO a familiar

CASCO ALL-WEATHER VISORS

WORLD'S BIGGEST SELLER! ONE MODEL FITS 90% OF ALL CARSI Aero-aluminum, finished in satiny pearl gray Hammerloid enamel, with beautiful chrome brackets and trim. Can be repainted, if desired. V-18 series LIST \$21.95



DEFENDABLE PRODUCTS FOR OVER A QUARTER CENTURY (CASSINI) CASCO PRODUCTS CORP., BRIDGEFORT 2, CONNECTICUT

Southeast Repr: LAWRENCE M. HIRSIG & CO., 201 Hildebrandt Bldg., Jacksonville 2, Fla.

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Name This New ARO Lube Gun

DRIZE-POLAROID CAMERA

11 other Prizes including Electric Shaver, Electric Toaster, Portable Radio, Cigarette Lighter, Pen and Pencil Set, er, Portable Radio, Cigarette Lighter, Pen and Pencil Set, Fishing Rod, Dozen Golf Balls, Picnic Set, Smaked Turkey, Fishing Box, Sports Jacket.

50 Cash Certificates

Check these Sensational Features!

High Pressure . . . 10,000 lbs.

One-Hand Operated.

Easy loading through fitting or barrel.

400 lubricating shots without reloading.

Spring-loaded barrel for positive action.

Here's the greatest ARO Gun you ever handled ... packs tremendous pressure ... full 3 oz. capacity ... weighs only 3-1/3 lbs. loaded. Relief valve prevents air pockets after refill. Many more all-new features.

This is the gun for you! It has taken a lot of research to develop it. Now we need a name... your chance to win a prize. Ask your Aro Jobber for a free demonstration.

ARO the Leader

LUBE EQUIPMENT . . . Also Grease Fittings . . .

Air Tools . . . Hydraulic Equipment . . . Aircraft Products

CONTEST BULES

- 1. Write a name for Aro's new 10,000 lb. Lube Gun. Use the bandy entry blank, writing paper, or a postcard. Be sure to sign your name and address.
- 2. Mail to Contest Editor, The Aro Equipment Corp., Bryan, Ohio.
- 3. Entries must be postmarked before midnight, Sept. 30, 1951.
- 4. Decision of Judges will be anal. In case of tie, duplicate prizes will be awarded.
- 5. All entries and ideas become the property of Aro and none will be returned.
- 6. Anyone may compete except employees of Aro or their advertising agency.

SEND YOUR ENTRY NOW!

Contest Editor

The Aro Equipment Corporation, Bryan, O.
My choice of a name for Aro's new Lube
Gun is—

Name....

Street.....

City.....State....



DECISION of the COURT:

"You are responsible rehen you park your car on the highway!.."

FOR COLLISION

FOR PERSONAL INJURIES

FOR PROPERTY DAMAGE

FOR FATAL ACCIDENTS

FOR WARNING CARS

VOLUME 125-NO. 91.

COURT OF APPEALS STATE OF NEW YORK

NEGLIGENCE-AUTOMOBILES-LEAVING & CAR PARKED ON AN A verdict for the plaintiffs for personal injuries and property damage

was warranted by evidence that one of the plaintiffs, operating an automobile owned by the other, was driving at a moderate Tate of speed on an elevated expressway in the City of New York, that the car immediately ahead of him swerved into the NOTE, THEN THE CAN IMMEDIATELY RUSSES OF RISH SWEETCR SHOW LINE
Middle lane of the highway, that he was thereapon confronted middle isne of the nighway, that he was therenyon confronted with a car which the defendant had left parked on the highway with a car which the defendant had left parsed on the highway and was unable to avoid colliding with this car, that the deand was unable to avoid colliding with this car, that the de-fendant, having engine trouble while he was driving on the renumnt, naving engine trouble while he was driving on the expressway, had left his car parked there while he went to expression, and left his car parsed there while he went to telephone for assistance and had made no arrangements to terephone for assistance and had made no arrangements to give warning to drivers of other cars. It was error to hold as give warning to drivers of other cars. It was error to muse as a matter of law that the defendant was guilty of no actionable. a matter or law that the detendant was guilty of no actionable degligence. One who parks his car on an express highway ought

JOSEPH AXELAGO Ct al., appellants, v. Essas Kauvinest et al., respondents. reasonably to foresee possibility of danger.

Ch.J., Lewis, Conway, Designers, Dys., Polis and Pacsassi, JJ

Sigflare



SIGNAL-STAT BUILDING 523-539 Kent Avenue, Brooklyn 11, N. Y.

The Wall Chart to End All Wall Charts . COMBINATION KIT NUMBERS CATALOG AND EASY TO READ WALL CHART EXPLODED COIL SPRINGS GROUPS ON ALL CARS KING BOLT KITS HELPS SELL HE CAR OWNER 100 Now Available Through Your Closest Moog Distributor

The wheel alignment specialist and the mechanic working on front end replacements will welcome this new Moog Coil Action Wall Chart, with easy-to-find part locations shown with exploded groups of all popular installations and required King Bolt Kit included.

Makes service sure and fast! All parts numbers plainly marked — a service-order chart that will help you get the right part for the job.

MOOG INDUSTRIES CO. ST. LOUIS 14, MO.

MOOG COIL ACTION PARTS CO.
MOOG PISTON RING COMPANY
ST. LOUIS SPRING COMPANY



NEW BATTERIES Willard Heavy Duty De Luxe

THE MOST POWERFUL BATTERIES AND THE BIGGEST VALUES YOU CAN OFFER AT POPULAR PRICES TODAY!

UP TO 56%

MORE STARTING
POWER AT ZERO!

NEW SEALING COMPOUND

—Stands more heat, Stands more cold!



NEW CONTAINER

- STRENGTH

where strength
is needed most!

GROUP 1

100 Ampere Hour Capacity Fits the following cars—

Chevrolet Crosley Dodge Kaiser Nash

Olds ('49-'50 —6 cyl.) Plymouth Studebaker Willys

THERE'S A SIZE FOR ALL



GROUP 2

115 Ampere Hour Capacity Fits the following cars—

Codillac Chrysler DeSoto Olds ('49-'50 8 cyl.



GROUP 2L

115 Ampere Hour Capacity Fits the following cars—

Ford (1947-50) Hudson Morcury (1947-50)

For complete list of cars and trucks
WILLARD STORAGE BATTERY COMPANY

with NEW POWER



Frozen in a huge cake of ice, a Willard Heavy Duty DeLuxe (Group 1 size) amazed 95 responsible witnesses by cranking a car for 12 minutes and 2 seconds. Then, after only two minutes for recuperation, this same battery cranked the same car for one minute and 26 seconds more to bring the total to 13 minutes and 28 seconds. How's this for proof of extra power for the coldest of cold weather starting!

CARS AND MOST TRUCKS



GROUP 2E

110 Ampere Hour Capacity Fits the following cars— Buick Olds (1938-48— 6 and 8 cyl.) Peckard



GROUP 2F

115 Ampere Hour Capacity Fits the following cars—

Ford (1940-46) Hudson (1948-49) Lincoln Marcury (1940-46)

these batteries fit . . . consult your Distributor
Cleveland • Los Angeles • Dalfas • Memphis • Portland • Toronto

NEW 1951 VICTOR GASKET GUIDE

Shows more! tells more! HELPS MORE!

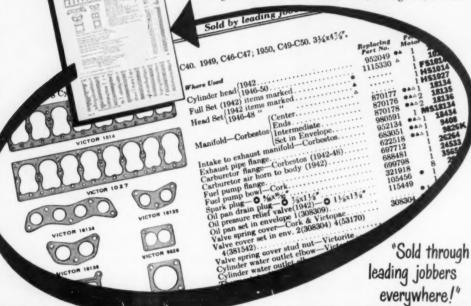
SIMPLIFIES GASKET ORDERING FOR ALL MODELS-OLD OR NEW

Here's a sample page showing how the Victor Guide lists all gaskets used and tells where each goes on all makes of engines. Each item is identified with factory part number and Victor replacement number. For added identification, all head gaskets and a lot of others are illustrated.

Only the Victor Gasket Guide gives you such complete, accurate listings for all cars, trucks, tractors, marine and industrial engines—old and new. Only the complete Victor line assures you of Quality Gaskets—individual or in sets—for every need.

GET YOUR GUIDE FREE - FROM YOUR VICTOR JOBBER

You'll save time and trouble—you'll speed up shop work by using this new Victor Gasket Guide regularly. Get your copy free where you always get what you need in gaskets — your Victor Jobber. Victor Mfg. & Gasket Co., P.O. Box 1333, Chicago 90, Illinois





VICTOR

Gaskets and Oil Seals

WOULD YOU PAY \$3.50 TO MAKE \$75. PROFIT A WEEK?



You can! Just like the Wnek brothers shown above.

FIRST. They asked for a free Pedal Blok. It's a slotted wooden blok that fits under the brake pedal, finds faulty brakes, in a minute, before pulling a wheel.

We'll send you one, no charge, with our compliments.

SECOND. The Wneks ordered one of our Minute Brake Check Kits. It contains a big, outdoor cloth banner, pennants, a 7 pc. display, post cards, folders, complete directions. And costs only \$3.50.

THEN THEY PUT IT TO WORK. They offered a Minute Brake Check to every motorist that drove in. Sold over \$150.00 worth the first week, and it's still going strong. To quote Ted Wnek: "We were amazed. We had no idea we'd get so much work or that customers would co-operate so willingly. That Pedal Blok sure is a money maker."

Write now, today, for your free Pedal Blok. We'll send it without obligation, plus full details about our Minute Brake Check Kit.

MAIL THIS COUPON NOW!

American Brakeblok 4616 Merritt Ave. Detroit 9, Mich.

Rush me your Pedal Blok, without obligation.

NAME.

ADDRESS

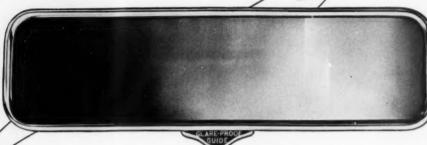
CITY

STATE



AMERICAN BRAKEBLOK DIVISION

Look into this...



THE NEW

GUIDE GLARE-PROOF REARVIEW MIRROR

Here is an accessory that will really sell... because more and more drivers are learning about its safety value and want it. It's an 8½inch-long prismatic mirror that gives a widerthan-usual view to the rear. A flip of the finger cuts out headlight glare from behind. There's a Guide Glare-Proof Rearview Mirror for most makes of cars.

··· and these



THE GUIDE SPOTLAMP WITH REARVIEW MIRROR combines a high-quality sealed beam spot lamp with a rearriew mirror. Both can be quickly and easily adjusted from inside the car. This accessory is sturdily made, has a durable finish for long life and lasting beauty.



THE GUIDE MULTI-PURPOSE LAMP gets its current from the cigarette lighter receptacle. Its 14-foot long cord makes it a portable and useful lamp that can be used in and all around a car. It provides a spare headlamp sealed unit—a real friend when needed.



GUIDE LAMP—A UNITED MOTORS LINE
Available everywhere through
UNITED MOTORS DISTRIBUTORS

Guide LAMP

Division of General Motors Anderson, Indiana this new Golden "Bear" gives you the Perfect Answers to **BIGGER BALANCING PROFITS:**



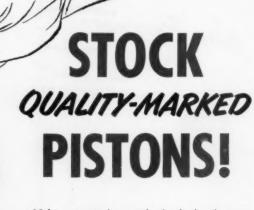


speeds up to 100 MPH! New indicator dial shows speeds.

See your "Bear" Jobber for the "Perfect" details or write for new "Perfect" 36 Data Sheet TODAY! BEAR MFG. CO., Dept. S-1, Rock Island, Illinois.

Do the Job RIGHT! take out the "WIGGLE" as well as the "BOUNCE" with the

BEAR



Make every engine overhaul a feather in your cap. Install replacement pistons trademarked ALCOA LO-Ex. That name means plenty! It tells you performance is backed by Alcoa's scientific knowledge of piston design, and testing under operating conditions. It identifies the extra strong, low-expansion alloy. Assures your customer cool, quiet power that's easy on gas and oil.

Always stock aluminum pistons of ALCOA

Lo-Ex alloy—cast by Alcoa, finished
by expert piston makers.

ALUMINUM COMPANY OF AMERICA,
1853 J Gulf Building,
Pittsburgh 19, Pa.

ALCOA LO-EX

ALT . @ TOEST @



PISTON
CASTINGS OF
EVERY TYPE











Strut



Service the the tool tha them



Thors

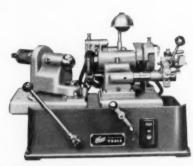
TOOLS

VALVE SHOP

Service the cars with



compute shops available, equipped will either No. 100 or No. 99 Refacer, Seat Grinder, wheel dresser, cabinet and accessories.



THOR MODEL 100 VALVE REFACER—Wet type, capacity $\frac{1}{4}$ " to $\frac{11}{16}$ ", extra heavy construction, speed chuck, lapped collet gear driven by own individual motor, complete with 4-purpose micrometer-feed butt grinding wheel and fixture.



HEAVY DUTY SEAT GRINDERS

Capacities to $2\frac{1}{2}$ " Wheel. 10,000 or 12,000 R. P. M.

COMPLETE LINE OF VALVE SHOPS

Silver Line DRILLS



Complete Line, 1/4" to 11/4"
Standard and Heavy Duty—For Every Shop Need
DRILL STANDS available for all sizes

The Thor SILVER LINE represents the highest quality in partable electric tools... pollshed, die-cast aluminum hausings; heavy duty ball bearing motors; heat-treated alloy steel geors; sealed switches... everything designed for greater convenience and long-lasting tool service.

the tools that build then



THOR MODEL 99 VALVE REFACER—Wet type, capacity $\frac{1}{4}$ " to $\frac{11}{16}$ ", same heavy duty construction as Model 100, but without butt-grinding wheel. Separate fixture, shown at right, permits butt-grinding valves, rocker arms, tappets on refacer wheel.



EXTRA HEAVY DUTY SEAT GRINDER

Capacity to 4" Wheel. 8,000 R. P. M.

ACCESSORIES, WHEELS, PILOTS, ETC. AVAILABLE



6 STANDARD VALVE SEAT KITS

Many Specials

Expanding and Plug Pilots

POLISHERS · SANDERS



7" Pad or Bonnet Standard and Heavy Duty—1400 R. P. M.



7" and 9" Disc Size
Standard and Heavy Duty — 4500 R. P. M.







INDEPENDENT PNEUMATIC TOOL COMPANY . AURORA, ILL.

SALT LAKE CITY

MILWAUTES

SEATTLE

CINCINNATI PHILABELPHIA LONDON FINGLAS CLEVELAND DE

CHIVER PETROIT UV. LOUIS LO, BRASIL

ST. PAUL TORONTO, CAMADA

"Give more...Serve better...Work harder...



There were no silver spoons in Chris' family only coal miners' shovels. There were no college diplomas on the wall . . . work overalls hung there. There were no doors to opportunity to open through family influence, position or wealth. What Chris won from life he won the hard way. And win be did!

Today Chris Verdi is the proud owner of one of the largest automobile dealerships in a city of its size in the United States. He has a fine family, owns a beautiful home and a 120-acre stock farm. But to a 13-year-old boy, rubbing the sleep from his eyes to don his work clothes, such a prophecy would have seemed like a smoke dream curling from Aladdin's magic lamp.



Underlying the story of Chris' success is a rocksolid foundation of helpful service, of genuine friend-ships, clock-defying hard work, and traditional Yankee determination to succeed. For \$3 a week, young Chris pushed a broom and ran errands just to get close to the great interest of his life-automobiles. His industry and initiative soon won him a job as car washer and mechanic's helper, and a boost to \$20 a week. He watched the old mechanics at work, studied their methods, pestered them to let him do repair work, and practiced at home on an old \$15 car he'd purchased. Before many years, Chris Verdi became noted as a mechanical wizard.

Opportunity knocked. A leading auto mechanic opened his own business, and asked Chris to manage the shop. The business prospered, Chris saved his money, and at last a long-cherished dream came true. Chris opened his own shop. In a single year he won the lion's share of the county's business. So noted was his mechanical work that even his com-petitors jobbed out repair work to him!

When the young businessman presented his record to executives of Dodge Division of Chrysler Cor-



poration they were impressed. He was qualified to establish one of the county's leading Dodge dealerships. Chris' strength in his community soon asserted itself. Before long he was setting sales records.

In one year he outsold both of his major competitors on both new cars and trucks. Today, a 30,000 sq. ft. shop-one of the most modern in the nation, supported



by a good parts department, a thriving used-car business, 35 people on his payroll . . . all this demonstrates anew the opportunity ever-present in the automobile business.

"Sell a value product, first of all," Chris advises. "Then, prove to the other fellow you're really his friend by giving him the best deal possible every time. And, I've discovered, it's a great satisfaction to be selling a product which is an essential part of the social and economic life of America."



PLYMOUTH . DODGE . DE SOTO . CHRYSLER . DODGE "Job-Rated" TRUCKS Fine Cars of Great Value

Hoy D, Cedans

CHANSLOR & LYON COMPANI

Gelehrist

Do you want to increase your battery sales and battery profits? That's the question Auto-Lite asked us years ago before we took on the Auto-Lite Battery line in California," says Roy D. Adams. "As predicted, the Auto-Lite Battery line is one of the most profitable we handle. One reason for this success is that only 'Sta-ful' has a network television and radio show, plus national

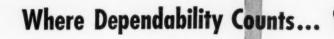
magazines, Sunday newspapers and a complete sales promotion program. What's more, Auto-Lite Batteries are original equipment on millions of cars and trucks. All this makes 'Sta-ful' easier to sell all the way down the line—to dealers, fleet operators and consumers.

"Auto-Lite is making sales and profit gains possible for us with the premium-profit 'Sta-ful'."









use PACKARD BATTERY CABLES

DEPENDABILITY is what is wanted in battery cables—the assurance that a touch of the starter means quick, positive starting every time—in any climate, and in any kind of weather.

That sort of dependability—day after day, year after year—has made Packard Battery Cables the standard of the industry... the standard by which all other cables are judged. And Packard Battery Cables are used as original equipment on more cars, trucks and buses than any other make.

Packard Battery Cables are full-size, full-weight ... deliver a full measure of value. They offer a choice of LeadAlloy terminals or leaded brass terminals—and both deliver top performance.

So, where dependability counts, use Packard Battery Cables—use the cable with proved performance, proved quality, proved superiority.





Packard Electric Division, General Motors Corporation
Warren, Ohio

FOREMOST BUILDER OF AUTOMOTIVE AND AVIATION WIRING

PACKARD PETE SAYS-

You're never in doubt with Packard Automotive Cables—for, when you use Packard, you use the finest. Packard Low Tension Cable with amazing "249 compound" insulation—Packard High Tension Cable in spools or packaged in sets—Packard Battery Cables with Lead-Alloy terminals or leaded brass terminals. All are nationally known, widely distributed. Standardize with Packard.

CONVERSATION or VISIBLE PROOF

Which Will Bring YOU
More Oil Filter Profits
2





Double your filter service volume . . . a WIX Director is equivalent to an extra man at your pump!



Today, with modern Heavy Duty Oils in the picture, you're as out-of-date judging the condition of motor oil by the dipstick or on a piece of paper as you'd be trying to sell gasoline from a barrel!

Only with the WIX Dirtector can you accurately show the condition of your customer's motor oil. Whether light or dark—clear clean or dirty—the WIX Dirtector gives both you and the motorist the TRUE answer!

Thousands of WIX dealers are cashing-in on this modern "Engineered Selling" tool. It is so important to sales and profits in oil and oil filter cartridges, that every service station should have a WIX Dirtector at every pump!

WIX, and only WIX offers you the WIX Director. Contact your nearby WIX distributor for full information. If your Jobber doesn't have WIX, write us today.



OIL FILTERS . CARTRIDGES

WIX ACCESSORIES CORP. GASTONIA, N. C.

CANADIAN FACTORY: WIX ACCESSORIES CORP. LTD., 11 Wabash Ave., Toronto 3, Ont.

world's <u>fastest-working</u> body jack equipment is **Bantam Porto-Power**

... and here's why!

- This is the ONLY COMPLETE line of hydraulic body jack equipment in the "bantam weight" class. This GREATER SELECTION of both *ami and attachments means more flexibility. ... more ways to PULL or PUSH ... greater efficiency on a wider range of body damage!
- 3. FASTER PULL, PUSH or SPREAD because only Blackhawk offers quick-switch of rams. . . Bantam gives you a change from a pash to a spreader to a pail setup lightning fast!

Equip every body man with a BANTAM... for a happier, more profitable shop!

The money-makers do it this way! They arm each man with a "Bantam" 2-ton "Porto-Power" and get much faster out-put on 90% of all body work, And, they salvage more body sections, make better bids on rebuilding work and collect more profit on used cars. You get "Bantam" equipment in low cost, portable kits or assortments. See your Blackhawk jobber,

"Porto-Power" is the exclusive (trade-mark name registered) product of Blackhawk Mfg. Co., Dept. P49), Milwaukee 1, Wisconsin

BLACKHAWK

If it doesn't offer you all this ...it's not a "Porto-Power"

- A full range of essential rams!
- Ability to PULL with FULL POWER!
- Easier handling . . . a single hose . . . revolving coupler . . . all-directional rams!
- Interchangeability of rams!
- Spreaders with built-in rams!



☐ A complete line of body work attachments! Specialized attachments for repair service! WHY ACCEPT INFERIOR SUBSTITUTES.

For Quality Automotive Equipment

REPLACE WITH CONFIDENCE

COLE-HERSEE



MANUFACTURERS OF CONSISTENTLY BETTER ELECTRICAL PRODUCTS FOR THE AUTOMO-TIVE INDUSTRY



NO. 5558 BAT HANDLE TOGGLE SWITCH



FLAP-LOCK TRAILER CONNECTOR



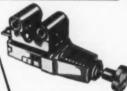
NO. 9097 DOOR SWITCH



NO. 5007 HEAVY DUTY SWITCH



NO. 7178 COMBINATION HEADLIGH & RHEOSTAT SWITCH



NO. 6893 HEATER SWITCH



NO. 5053 FUSED PUSH-PULL SWITCH



NO. 8299 AUXILIARY SWITCH PANEL



NO. 7077 UNIVERSAL DEPRESSING SWITCH

COLE-HERSEE CO

20 OLD COLONY AVE., BOSTON 27, MASS.

Sales Follow Readership and MORE SOUTHERN RURAL FAMILIES READ FARM and RANCHSOUTHERN AGRICULTURIST THAN ANY OTHER MAGAZINE

THERE'S PROSPERITY ON WHEELS IN THE BOOMING SOUTH TODAY...

Automobiles . . . trucks . . . tractors—there are 1,800,000 more of them on Southern and Southwestern farms and ranches today than there were in 1940! This great mechanization of Southern farming and ranching has created a sales potential of vast proportions. You'll share in it . . . you'll step up your sales and your profits—when the products you sell are pre-sold for you by advertising in the South's favorite magazine—Farm and Ranch-Southern Agriculturist.



CIRCULATION GUARANTEE 1,290,000

- Farm magazines are No. 1 publications influencing sales
 and
- FARM and RANCH-SOUTHERN AGRICULTURIST reaches more people with more money in the rural South than any other magazine...
- It puts your product story in more Southern homes, at less cost, than any other magazine!

It's that simple—more readers mean more buyers. Write, wire or phone for the number of Farm and Ranch-Southern Agriculturist subscribers in any Southern or Southwestern county. Compare these figures with those of the second farm publication—and you'll be convinced!



Farm and Raneh
Publishing Co.
318 Murtreesboro Road
Nushkeille 10, Tenn.

Telephone: 42-5511

New York 17 122 E 42nd St. MUrray Hill 5-6815

Chicago 1 133 N. Michigan Ave. Dearbarn 2-5182 Arianta 1 1036 Peachtree St. N.E. Elgin 1800

Los Angeles 17 Simpson Beilly, Ltd. 318 Halliburton Bldg 1709 W. Em St DUnkirk 8-1179 Dallas 2 2027 / Young S Riverside 1181

San Francisco 3 Simpson-Reilly, Ltd 814 Central Tower 703 Market St. Douglas 2-4994

Let this LIE advertisement help you sell



V ME LEAS SETTINGS
TREETING HE HIS SETINGS
TREETING HE HIS SETTINGS
TRE



THERE AGAIN I HAD TO GIVE THE CREDIT TO GENUINE FORD BAIRTS. BECAUSE THEY RE MADE RIGHT TO GIT RIGHT, THEY NATUR-ALLY CUT SERVICE TIME (AND AS A RESILL CAT SERVICE TIME (AND AS A RESILL



"AND BECAUSE THEY'RE TESTED AND AMORDINED BY THE PEOPLE WHO MAKE FARDS, THEY'RE A SAFE BET TO LAST LONGER_AN IMPORTANT CONSIDERATIO THESE DAYS!"



FORD Division of FORD MOTOR COMPANY

You are HEADQUARTERS

for more

Ford

Service Business

... when you display this sign



When you display the familiar blue and white Genuine Ford Parts sign, you let Ford owners know you use the *right* parts for Fords. And, you take advantage of national advertising that helps you rank high in Ford service profit, with more and more satisfied Ford customers.

Here's Why:

More than 40,000,000 readers of LIFE, LOOK, and other national magazines are reached each month by attention-attracting ads like the one reproduced at left.

That means Ford owners in your area are continually reminded that Genuine Ford Parts are the right parts to save them time and money. And they're reminded that the Genuine Ford Parts sign marks your shop as headquarters for the service that features the parts they want.

★ Order Genuine Ford Parts today! Ask your Ford Dealer how you can get the Genuine Ford Parts sign that attracts extra Ford Service, extra profit for you.

Can you double your lubrication sales in just one year's time?

nswer: Marcoux Bros., Inc. DID!

· No secret formula, the Alemite

"Magnet Plan" employs the good com-

mon sales-sense of not stopping with the sale of a \$1.50 grease job . . . but

going far beyond it to the sale of prof-

itable parts and service business in

every department. Your grease rack

is the customer-attracting "Magnet."

 During 1950, Alphonse Marcoux saw his lubrication and oil sales rise from \$2545 to \$5272! Analyzing the 107% increase, this Woonsocket, Rhode Island Chevrolet dealer gives full credit to Alemite's sensational 30,000 mile guarantee. Begun at the "Home Of Quality Service" one short year ago, this exclusive Alemite "Magnet Plan" feature has also resulted in a 33% increase in new car customers returning for service.

will show you how!

Alemite provides you with the ideas

and services that will help you build more regular business and produce

more repeat business year after year. Find out how well these exclusive

Alemite "Magnet Plan" features fit

your needs, your operation. Call your

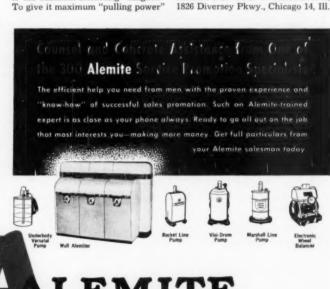
Alemite Distributor or write Alemite.

Alemite "Magnet-Plan" Services Only Alemite Gives You All 11-Fully Tested, Fully Proved!

- 1. Counsel and concrete assistance from one of the 300 Alemite Service Promotion Specialists.
- 2. Powerful Alemite National Advertising-year after year-pre-selling lubrication prospects for you.
- 3. "Business Expander" follow-up systems.
- 4. "Prescribed Lubrication" program.
- 5. Sales-building seasonal campaigns.
- 6. "Gusher Plan"... to build motor oil sales at the service bay.
- 7. "Sales and Service Security Plan" including the 30,000-mile guarantee for new and used cars and trucks up to
- 8. Monthly Analysis Sheets, to prove increased service sales.

STEWART WARNER

- Alemite Equipment for-
- 10. Electronic Wheel Balancing Service.
- 11. Underbody Coating Service.
- 9. Specialized Lubrication Service.



Oldest, Most Reliable Name in Lubrication

There's

POWER BRAKING

Make the Most of it!

Only the Bendix Franchise

Gives You All These Advantages

You sell the Bendix* Hydrovac*, world's most famous and widely used power brake.

A complete line of vacuum power brakes and other vacuum controlled equipment.

Compact Bendix Repair and Installation Kits simplify stocking and service workgive you just what you need for every job.

Under the Bendix Unit Exchange Plan you can build a profitable business repairing vacuum power units in your own shop.

Bendix simplified service instructions and training aids make it easy for your mechanics to learn vacuum power repair procedures.

You are backed by the greatest name in braking.

PRES. U.S. PAT. OFF.

These Bendix signs stand for good business and good business relations between factory, dealer and customer.

SELL AND SERVICE

Bendix Hydrovac

The World's Most Widely Used Power Brake

The Bendix Vacuum-Power Sales and Service Plan puts you in a position to take full advantage of one of the fastest growing service markets in the field. Every part of this program is designed to help you-making power brake work easy as well as profitable. Add to this the world famous reputation of the Bendix Hydrovac and you will agree—the Bendix Power Brake franchise means good business any way you look at it,



SOUTH BEND

INDIANA

Export Sales: Bendix International Division, 72 Fifth Avenue, New York 11, N. Y.





Original Equip



edian Sales: Bondix-Eclipse of Canada, Ltd., Windser, Ontario, Canada

SOUTHERN AUTOMOTIVE JOURNAL for SEPTEMBER, 1951

31

ENGINEERED



GRILLE GUARD



GRILLE GUARD
WITH WINGRAILS



ADJUSTABLE LICENSE PLATE FRAME

CELLO

PROFITS PROTECTION

LATION

You want extra
profits . . . your
customers want the
best protection for
their cars. When you
sell CELLO both you and
the customer are satisfied,
because Cello Grille Guards
are specifically ENGINEERED
to provide the finest protection
money can buy.

Only top-quality materials and workmanship go into the making of Cello Guards.

Join the thousands of successful merchandisers who are now featuring Cello Grille Guards, and get your share of the extra profits the complete Cello line provides. Styles to fit all makes. 1946-1951.

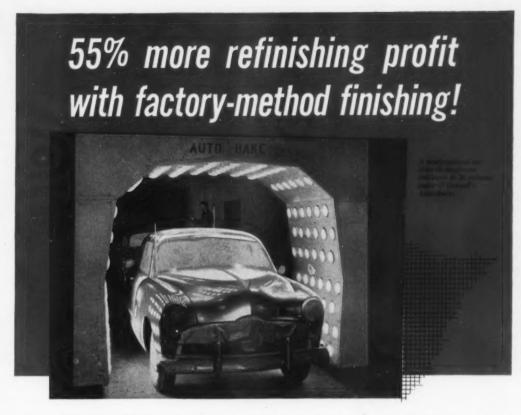
For full information on Cello Guards and License Plate frames write to the factory today for FREE catalog pages and price lists.

your GUARD for life

Cello Products Co.

161 Prescott Street East Boston 28, Mass.

SOUTHERN AUTOMOTIVE JOURNAL for SEPTEMBER, 1951



*Exceeded highest hopes!" writes Donald A. Schafer, Sr., general service manager of E. M. O'Donnell Co., Inc., Syracuse, N. Y., one of the largest Ford dealers in the country. "When we installed our Brake Shoe equipment and began to promote factory-method finishing in our advertising, volume went up and costs came down. Profits are now up 55% in the refinishing department, 60% in the body shop department!"

Jobs advertise the shop. "We've maintained a steady volume of refinishing all year long, and can now handle 15 complete jobs a day. The high quality of the finished jobs has occasioned favorable comment, and brought much new work into the shop. The equipment is trouble-free . . . maintenance next to nothing."

What about you? You can cash in on your local area's share of the huge national refinishing potential—the more than 28,000,000 cars over 5 years old now in use, plus the extra emphasis on maintenance created by the probability of cut-backs in manufacture—by putting the Brake Shoe factory-method finishing plan to work in your neighborhood.

WHAT EQUIPMENT WILL YOU NEED?

- The mobile, infra-red Auto-Bake oven, that dries a showroom finish to granite hardness in 30 minutes.
- The Micro-Spray gun, which sprays an extrasmooth finish by atomizing paint extremely fine and distributing it exceptionally evenly.
- 3. A standard packaged spray booth to prevent dust and turn out jobs cleaner and safer, is often a profitable investment.
- A Kellogg-American air compressor to economically supply air to meet peak loads without loss of operator time.

Mail the coupon today for detailed information on how Brake Shoe can help make your shop the Number One refinishing shop in your area.

American Brake Shoe Co. Kellogg Division 96 Humboldt Street Rochester 9, N. Y.

- Please send me detailed information on the Brake Shoe Turnover Plan.
- Please have a representative call to discuss the Brake Shoe Turnover Plan with me.

KELLOGG DIVISION, 96 HUMBOLDT ST., ROCHESTER 9, N. Y. - DOMINION BRAKE SHOE COMPANY, NIAGARA FALLS, ONT.







In time of emergency your Chevrolet dealer can be an even greater asset to you. His Parts and Accessories Department can serve as your personal warehouse of precision-engineered, quality manufactured replacements. And these uniform Chevrolet parts help you assure continued satisfaction for your service customers.



IMPORTANT FACTS for independent garage men

You're sure of a large, continuing demand for the parts you obtain from your Chevrolet dealer-because more than one out of every four vehicles on the road today is a Chevrolet. Be prepared for this constant, profitable service market. Order parts from your Chevrolet dealer today.

FOR YOUR BEST DEAL ··· DEAL WITH YOUR CHEVROLET DEALER





This is one of a series of spirited sporting scenes (in full color, without advertising) available on request. Write for your free set today.

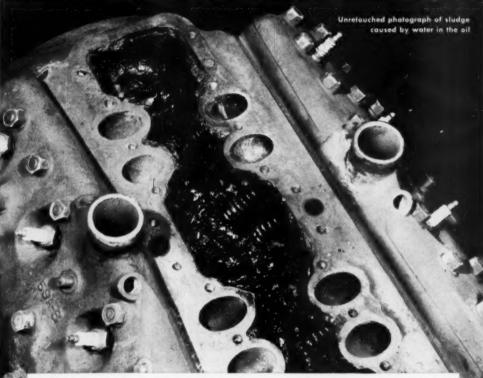
"CHEAP TOOLS ARE FOR CHUMPS", say men who have a feeling for tools. And to them, "Bonney" means wrenches, just as "Disston" means saws or "Arrow" means shirts. To men who know best, the Bonney name is a guarantee of lightness, strength, balance and precision... a better job, in less time, with greater safety.



BONNEY FORGE & TOOL WORKS, ALLENTOWN, PENNSYLVANIA

ACCORDING TO ACCEPTED AUTHORITIES

WATER IS THE MOST



WATER IN THE OIL STARTS ENGINE DAMAGE LIKE THIS!



WATER CAUSES SLUDGE the major cause of engine operating difficulties. Water in the presence of soot, lead compounds, road dirt and other solids in the oil creates a pasty, mayomerise-like condition which is the starting point of sludge.



WATER MAKES ACIDS
the major cause of engine wear. Highly acidic
blow-by fumes condense in the presence of
water, form dangerous corrosive acids which are
carried in the water contamination of the oil
stream to all parts of the engine.



WATER DESTROYS DETERGENCY the newest advancement in lubrication. According to well-known suthorities, water contamination in the oil can destroy certain of the dispersant or detergent actions of modern heavyduty oils.

OBJECTIONABLE OF ALL OIL CONTAMINANTS!

Exclusive Walker Patented "Laminar" Construction not only Removes Road Dirt,

Metal and Other Abrasives — But Provides Extra Protection Against "Crankcase

Moisture" . . . The Cause of Wear-Producing Acids and Sludge

• Of course it is important to remove solid abrasives which collect in the oil stream. Walker Oil Filters take care of that by famous "3-Way Filtration." But, according to unbiased authorities, the greatest enemy of motor oil and good lubrication is not abrasives. It is "blow-by contamination" from the combustion chamber.

In addition to creating soots, carbon and lead compounds, blow-by is the major source of "crankcase moisture"—or water in the oil. And water in the oil is the most dangerous of all oil contaminants. Water in the oil is a "triple threat."

It is the chief cause of sludge. It is
the source of corrosive, wear-producing crankcase acids. It can destroy
certain detergent or dispersant actions of the new heavy duty oils.

Because of the unusual moisture absorbing ability of the particular wood cellulose fibres used, Walker Oil Filters render a valuable plus service in the control of dangerous "crankcase moisture."

By selectively removing water from the oil, the Walker Oil Filter functions to prevent the formation of sludge by helping keep the moisture content of the oil below the "sludge danger zone" . . . it minimizes corrosive acid wear by absorbing the acids contained in the water it removes from the oil that passes through it.

Regardless of what filter your customer may have on his car, give him the benefit of full protection from all dangerous oil contaminants—including the most damaging of all . . . water . . . by installing a Walker Oil Filter Cartridge.

WALKER MANUFACTURING CO. OF WISCONSIN . RACINE, WISCONSIN

WALKER

WITH PATENTED Laminar CONSTRUCTION



There are profits for you profits for you in these top automotive lines

You can depend on the lines in this folder...

LAWRENCE M. HIRSIG & CO.

201 HILDEBRANDT BLDO.

JACKSONVILLE 2, FLORIDA

and on the men who carry it!

They are Automotive lines that give you finest quality, greater value and quick turnover. They are produced by basic manufacturers and backed up by outstanding merchandising programs. The Hirsig Organization is made up of a total of 43 men and women trained and experienced in the automotive industry—prepared to render a complete automotive sales service in the South.

Dependability for exacting jobs...

37 year record of

SIDUX TOOLS

For Speed ... Ease ... Reduced Costs ... Greater Profits—Shops everywhere depend upon SIOUX TOOLS.



Action picture of SIOUX Electric Polisher. Balanced operation... no swirls... just exceptional polishing.

Sold only thru Authorized SIOUX Distributors

STANDARD THE



WORLD OVER



WEAVER TWIN POST L

is the ONLY automotive type lift that can handle ALL wheelbase lengths without loss of lifting capacity!

Yes, the WEAVER TWIN POST LIFT is the ONLy automotive type lift that offers wheelbase justment from 40" minimum to any desired imum . . . Provides unobstructed under accessibility. No rails in the way. It more in a lift than any other devo more working room . . . more dependence exclusive features . . . more duction for your shop. It pays

Ask your jobber, or write and time study proof of the study proof of t

With rear post remaining in position, the front post is adjustable to any wheel base length, for example — the EC-100 Twin Post Lift can be installed to handle an 80" wheel base Crosley and a 164" wheel base Cadillac Ambulance.



WEAVER MOTOR SUPPORT

The Weaver Meter Support is inexpensive and prevides a convenient method of supporting motor, and thereby increases production on removal and replacement of transmissians and rear motor mountings. Furnished complete with hydraulic jack for raising and lowering cantact channels.

WEAVER

SERVICE SHOP EQUIPMENT

WEAVER MANUFACTURING CO., SPRINGFIELD, ILL.

Twin Past Lifts . . . Unit Lifts . . . Wheel Alignment Equipment . . . Headlight Testers . . . Brake Testers . . . Wheel Balancing Equipment . . . Jacks . . . Dollys . . . and Air Compressors .



"I proved to myself that there's

50% MORE PROFIT

WON Nokorode"

UNDERCAR SEALER AND SILENCER

"Concentrated Lion Nokorode gives me 50% more profit on each drum!"

Most ordinary undercoatings have a big percentage of solvent. When sprayed 1/8'' thick they dry about 1/16'' thick. Lion Nokorode sprays 1/16'' thick—dries about 1/16'' thick. Result: you do 50% more cars per drum! Yet Nokorode costs no more.

"Lion Nokorode is easier, quicker to apply—saves labor costs!"

Nokorode is uniform for smooth application. It's homogenized—won't clog guns. That means you do more jobs at less labor cost. It's naturally black—no useless coloring added.

Made and Guaranteed by

EL DORADO, ARKANSAS



PONOROFORE

IS NATIONALLY ADVERTISED IN

SETURDAY POST

AND TIME

Powerful, Consistent Advertising
That Pre-salls Your Customers!



"I clipped this coupon for full details on Lion Nokorode's profit plan!"

LION OIL COMPANY, El Dorado, Arkansas Please send me complete details on how I can increase my undercoating profits with Lion Nokorode Undercar Sealer and Silencer.

	I am using now, if any
City	State
Street	

Big....Colorful Wagner Ads in Post and Collier's

... direct brake service business to YOU

> Tie in with Wagner's sales producing national advertising Now!

Millions of car owners see the colorful halfpage Wagner ads appearing regularly in The Saturday Evening Post and in Collier's. Potential customers are being directed to automotive service shops and stations who identify themselves as Authorized Wagner Brake Service Stations or as Dealers of Wagner Lockheed Hydraulic Brake Fluid. Act today. Ask your Wagner jobber for details.

Wagner Electric Corporation

6362 PLYMOUTH AVE., . ST. LOUIS 14, MO.

(Branches in Principal Cities and i



For Safety's Sake... WISE-UP.... CHECK-UP BEFORE YOU SMASH-UP!

If you can push the brake pedal nearly to the floor board before the brakes take hold-let that be a

warning to you.

Why gamble when safety is involved? Have a mechanic check the brake system. Minor corrections now may save major repairs—or a varning to you. now may save major. If brake serious accident—later . If brake fluid, or brake parts, or brake lin-ing may be required—for safety's sake unsist upon Wagner products. You can depend upon Wagner quality because Wagner products are used as original equipment by automobile, truck, and trailer manufactures. automobile, truck, and trailer manufacturers. You can get brake sorvince—where Wagner products are used—in your neighborhood. If you don't know where—ask us to you don't know where—ask us to tell you the nearest dealer prepared to supply Wagner products.

Wagner Electric Corporation

WAGNER LOCKHEED Hydraulic Brake Parts, Fluid and CoMax Brake Lining



class, except Barbara. Poor she has to go to it." The chair rocked crazily tars slammed down before table, holding her bands cheeks and staring straig dun't have.

table, bulding her han cleaned and staring strong and familiary and the strong strong and the strong strong

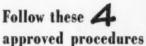
Having given up R. stood at the phone co. Hilldale — ets twelve away, please." As i Hilldale -- est tweeter away, please. 'As i know the Hilldale in of a broken heart. mother or no most out and get a job. Doing what? Af run over her talent same old tired c

thought forlornly world was a certa For. And with. To Rash of light — Pt

ling all crumb "Barbara?" She gave a pen writing w

H51.7

Gasket Right to insure Praise-Winning Jobs!

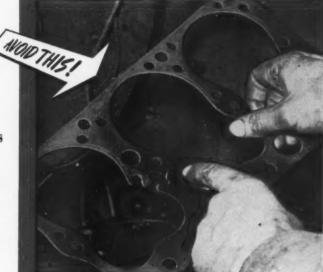


when

REMOVING

Cylinder Heads

CLEANING



No. 1. Let Engine Cool Before Removing Head!

A simple precaution that is often overlooked—the engine should be allowed to cool before the cylinder head is removed. Removing a hot or warm cylinder head will usually result in warpage. A warped cylinder head will not "seat" properly and loss of compression, leakage



will not "seat" properly and loss of compression, leakage and early gasket failure will result as shown in illustration above.

No. 2. Clean Head and Block Thoroughly!

Thorough cleaning of the cylinder head and block is important. All carbon deposits should be removed either by scraping or soaking in metal parts cleaner. Cylinder walls, piston heads, valves and bolt holes as well as inside of cylinder head should be blown off with an air hose. Blowing out the water jacket within the head will



r jacket within the head will prevent particles from dropping, in the gasket when the head is put in place. Dirt particles form pockets in the gaskets, allowing leakage and eventual gasket failure.

No. 3. Check for Warpage and Distortion!

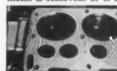
Carefully check head for warpage and pitting and block for distortion, dents or pitting. Checking the head and block with a straight edge will show any warpage or distortion that has occurred. Pits in the head will show up



at the water passages and around the combustion chambers. Surface irregularities must be remedied to insure proper gasket and engine performance,

No. 4. Do Not Remove Excess of Metal!

A word of caution—if head is to be refaced, care should be taken to remove no more metal than absolutely necessary. The compression ratio is rapidly increased as metal is removed. If it is evident that the head has



been refaced several times, it should be replaced. Engines are not made to take radical increases in compression ratios without extensive rebuilding.

Always use new gaskets—installing used gaskets is false economy that results in costly come-backs and loss of customer goodwill.

Gasket Right with FIEDRO Gaskets!



With Fel-Pro you can be sure you have the right gasket for the job. You can count on gaskets that match or excel original equipment in rit — QUALITY and PERFORMANCE! Every Fel-Pro Gasket is thoroughly tested and proven—designed and engineered to give you Praise Winning Jobs every time.

FELT PRODUCTS MFG. CO., --- CARROLL AVENUE, CHICAGO 7, ILLINOIS
FAST SERVICE ASSURED By Warshouses Near You...ATLANTA, BOSTON, NEW YORK, LOS ANGELES, OAKLAND, PORTLAND,

New Britain FLEX HANDLE A HANDFUL OF JOB-POWER FOR EVERY MECHANIC!

When you get your hands on a New Britain Flex Handle you'll know why they're Tops in Tools! Their solid feel tells you here's a Tool built for rugged, fast action, and lots of it! It's perfectly balanced, slim and long reaching to get in those tough spots!

Feel that hand-hugging grip... prevents slipping and fumbling when you put extra pressure on tough nuts. Run your eye down the gleaming shank of finest alloy steel, expertly forged and heat treated for tremendous pulling power, triple plate, chrome finished for long rust-free life. See the five position adapter? It's designed to work at all angles, gets you into tight places, around obstacles!

Here's brute power that handles like a baby . . . team it up with famous New Britain Sockets, Cross Bars, Universals and Extensions to turn out fine work the fast, easy New Britain way. Call your NAPA Jobber, he'll gladly show you the great New Britain Line. The New Britain Machine Co., New Britain, Conn.



GREATER STRENGTH - BETTER FIT

Talking about Gasoline Mileage...

. . . which so many of your customers talk about—here's a message that pins down the story of fuel economy.

It tells about a few of the things that GM does to get more mileage, more power out of gasoline. And it shows how this program keeps progressing through the years.

Yes, it's one of the important advertisements in GM's "Key" campaign. Like the others, it runs in top national magazines—usually in full color, often as a two-page spread. Your customers will read it and learn that the initials GM also stand for Gasoline Mileage.

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extinue of each by the particular particular

6. Chill 3 to 5
ming.
force to strey, drainful
7. A topospenice
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speries obstanted in springer speries of the sperie

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WIND HOMES & GARD



How two gallons came to do the work of three

 $S^{\text{pectacular}} \ advances \ \text{in} \ automobile \ performance do not often come about overnight. Most result from years of patient research.}$

Typical is the long-continued engine-fuel efficiency study that now enables current General Motors cars to get as much as 50% more work out of a gallon of gasoline than their predecessors of twenty-five years ago.

For the basic assignment of GM research is to be dissatisfied with things as they are—to keep applying the latest knowledge of physics and chemistry - to keep examining metals, plastics, finishes, every material and method of possible future use in cars.

These research discoveries are the beginnings of better engineering and of better manufacturing. Out of their combined efforts come the steady year-by-year advances that add up to pecemaking improvements in quality, performance and value in all General Motore sers—and to something more.

For these advances also help GM to do a better job supplying America's needs in times of crisis.



Koy to better engineering

THE FIFTH WHEEL—one of mong devices used in 25,000-nile test drives at the GM Proving Ground. Precisionly Prictionlens, it enables engineers to gauge speed with extense accomes before manuscrip before manuscrip before manuscrip before manuscrip before manuscrip before and the province of the province before the province befo

GENERAL MOTORS

CHEVROLET - PONTIAC - OLDSMOBILE - BUICK - CADILLAC BODY BY PIBMER - CMC TRUCK & COACH



YOUR KEY FO GREATER VALUE the Eng to a Grantel Motors Cor



Kog to better manufacturin

THIS PUSH-BUTTON CIANT typifies countless tools descripped in GM's search for steps to build better, fuel-theritize engines. It mitting shows cylinder heads exactly-replacing a dozen slow milling mechanics, Such tools enable GM to do a excision side on a name scale to GM care and minimum whiching.



riple Action Eainbow

Better 3 ways

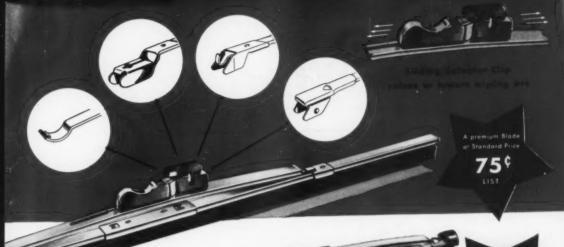
They FLOAT.. they FLEX.. they HUG THE GLASS To give the CLEANEST WIPE EVER SEEN!

Ten million television screens . . . millions of magazine advertisements . . . next month will tell motorists about these new Trico Wiper Blades.

This will bring you hundreds of customers. You can fit any car they drive, no matter what make or model ... right out of the box onto the windshield. No fumbling! No fiddling with adaptors! These blades fit any arm!

And, they are better-wiping blades, premium blades . . . and they look it! But they are standard priced for fast turnover, bigger profits!









make, any nimbel. It constant Trace Tuple
across for flat we dehields. Trace Rambows
for corver windshields—replacements for Trace
year-land or imprent blades on millions of cass.
Order this lumcost D-101 Package from your
Jobber and cash in on the pational television in

Wiper Blades

Forther shields Blades

Printow for Gund shields

TRIPLE Action

Windshield Wipers

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Large Corporation, Buffalo 3, N. V.



"Jim has been a good customer for years. He's halfway through a trip when a front wheel bearing burns out. So when he gets back he presents me with a nice, fat liftle Towing bill. This not only hurts me in the pocketbook but teaches me a good lesson. From now on it's new oil seals on every front wheel re-pack job, just like the automobile manufacturers recommend. It's cheap insurance against bearing failure, and I find my customers never kick about the few pennies new oil seals cost."

Install a new oil seal
whenever you take one out!

—car manufacturers recommend it





NATIONAL MOTOR BEARING CO., INC.

General Offices: Redwood City, Calif.
Plants: Redwood City, Calif.; Van Wert, Ohio

Handy cabinet at no cost with fast-selling assortment



For lube stations

Experience shows it is very difficult to remove an oil seal without damaging it beyond further safe use. Keep an assortment of National Oil Seals handy so you can put in a new seal every time you take one out. National has two assortments available; one contains front wheel seals only and the other both front and rear wheel seals for the most popular cars. Every seal is a fast-selling number. You get the cabinet at no cost when you buy the initial assortment. See your jobber about it now.

2289



Snap-on Tools

"help a man make time make friends—make money"

In plain words, Mr. Jalovec tells you why thousands of shops—tens of thousands of mechanics—look to the "Snap-on Man" for money-making tools. In actual shop experiences (case histories on request) mechanics report boosting income 20 to 40 per cent after replacing ordinary tools with Snap-ons. They're true professional tools—designed for speed, built for tough endurance. More than 4,000 to choose from. Brought right to the bench so you can pick and try them on the job. It's been "the time-saving way to buy time-saving tools" for more than 30 years. If you haven't one of Snap-on's 104-page FREE Catalogs, write—



SNAP-ON TOOLS CORPORATION

8052-1 28th Avenue Kenosha, Wisconsin

*Snap-on is the trademark of Snap-on Tools Corporation





Sim Hughes Pittsburgh Branch

"Ollie" Parillo Los Angeles Branch





Because of CORALOX

More and more car owners are daily discovering the many advantages of AC's patented CORA-LOX Insulator . . . learning by their own experience that CORALOX keeps plugs cleaner, makes them surer firing, gives them longer life. AC Spark Plugs with patented CORALOX Insulator are standard factory equipment on nearly as many new cars as all other makes combined. This original equipment leadership plus the great owner satisfaction AC's enjoy make AC Spark Plugs your best bet for volume profit.



AC FLEXIBLE GAS AND OIL LINES

Assortment, with attractive Wall Merchandiser, displays as well as stocks fast-moving numbers.



AC GASOLINE STRAINERS AND ELEMENTS

Available in handsome Counter Merchandiser for attractive display and easier sales.

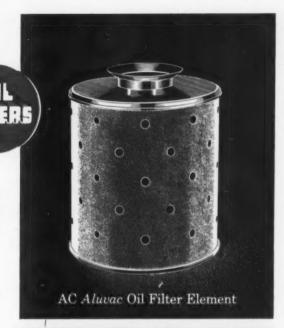
Hottest Filter Line on the Market

Dealers handling AC Aluvac Oil Filter Elements are sharing in sales that are big and getting bigger all the time. AC Aluvac Elements are standard or optional factory equipment on

BUICK

OLDSMOBILE CHEVROLET

Other owners like AC *Aluvac* Elements, too. Stock AC's and get *your* share.





PUMPS

40,000,000 in Daily Use

The vast majority of cars on the road have AC Fuel Pumps under their hoods . . . more than 100,000,000 AC's have been built . . . over 90% of all automotive vehicles were AC-equipped. AC originated the fuel pump.

It was America's first ... and it's still America's finest

AC SPARK PLUG DIVISION . GENERAL MOTORS CORPORATION



AC AIR CLEANERS AND ELEMENTS

Heavy-duty cleaners; renewal elements. AC's used as equipment by 80% of car manufacturers.



AC SPEEDOMETER CABLE-CASING ASSEMBLIES

Also supplied in tailormade cables, or as bulk cable and casing, with parts.





There's a big difference between

corn...and...unicorn

—and there is a powerful difference, too, between performance and "ETHYL" performance!



Yes, there's a powerful difference between the performance of an engine using just gasoline and one using "Ethyl" gasoline. When you set the timing to take full advantage of "Ethyl" gasoline's higher antiknock quality, your customer gets "Ethyl" performance—more power, quicker starting, more mileage. And you get happier, more satisfied customers.

ETHYL CORPORATION, New York 17, New York

Other products sold under the "Ethyl" trade-mark; salt cake...ethylene dichloride...sodium (metallic)...chlorine (liquid)...oil soluble dye...benzene hexachloride (technical)

WOULD YOU RISK 17?

34 HARD DEAD STOPS From 40 M.P.H. On Down Grade to 13% All in a 2 Mile Stretch In 5 Minutes Elapsed Time

We Completed these Gruelling Tests...

- with lots more stops in reserve
- with brakes holding well
- / with no original hot fade
- with no secondary cold fade

That is the ROAD TEST PERFORMANCE behind a

MASTER BRAKE LINING!

If the brake linings you supply your customers will not stand that much punishment - and we know from actual tests that most linings on the market will stand only 4 to 9 hard dead stops before they fade - you are not supplying your customers with the maximum in safety. You are really sticking your neck out when you sell linings which are liable to result in injury or death to your customers. CUSTOMERS are too hard to get to take a chance on putting them in the ditch by supplying inferior linings. Give them LASCO SUPER-BLOX - and they will remain your customers longer.

LASCO SUPER-BLOX are available in a complete range of sizes for all trucks and passenger cars. It's without doubt the finest brake lining on out aount the tinest prace titing of the American market today. Order a stock today!



- SEGMENTS
- SUPER-BLOX
- ENGINEERED SETS





MANUFACTURED BY LASCO BRAKE PRODUCTS CORP., LTD.

SOUTHERN HEADQUARTERS • 300 MADISON AVE • MEA'PHIS, TENNESSEE EASTERN HEADQUARTERS • 2131 LOCUST STREET • ST. LOUIS, MISSOURI

KANSAS CITY, 1630 McGEE ST. . FORT WORTH, 910 FLORENCE ST. . ATLANTA, 843 MEMORIAL DR., S. E.

Spokane · Salt Lake City



ONE OF 142 Quality Checks

When automobile designers adopted the curved windshield, they automatically emphasized the importance of extreme care in producing safety glass. In the manufacture of curved windshields, slight deviation from the curvature specified might result in defects in the lamination and possibly faulty installation.

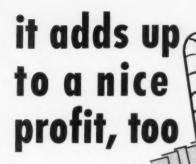
That's why we use our Quality Control No. 140 in the manufacture of curved L.O.F Safety Plate Glass. This is an inspection test in which the finished windshield is checked against a master jig. It is only one of 142 Quality Checks and Controls we use in making L·O·F Safety Glass. Each of them is equally important to you and your car owner customers-because they assure:

- 1. Better heat stability
- 2. Better light stability
- 3. Better strength for safety
- 4. Better adhesion, glass to plastic

That's why L·O·F Safety Plate Glass is the best you can get anywhere. Libbey Owens Ford Glass Company, 8191 Nicholas Building, Toledo 3, Ohio.

NO FINER GLASS THAN LIBBEY-OWENS-FORD





I CAN CARB MASTER +ICAN SIX MASTER =PEAKPERFORMANCE

That's the new, sensationally fast and inexpensive motor tune-up that's taking the motoring world by storm this Spring. It's called

the new

TER METHOD

mbination tune-up* for

- MORE MILES PER GALLON
- MORE POWER FROM ENGINES
- MORE YEARS OF SERVICE FROM CARS

* Pour a can of Six Master into the crankcase. Six Master dissolves all motor varnish, gum and carbon sludge; frees all valve mechanisms; removes all sticky substances from

rings and ring grooves, thus improving compression. Six Master also adds to the oil the 5% high detergent so important in late model cars.

*Give the carburetor a Carb Master cleaning without dismantling. (The only mechanical work required is the disconnection of the air cleaner for access to the Venturi tube, and the disconnection of the fuel intake line for access to the float chamber.) Carb Master completely dissolves all gums and sludge in the carburetor - leaves it new-metal clean. After a Carb Master treatment, any car is certain to give more miles.

> Put your own price on this service. Car owners are ready for it, because the Master Method really gives peak performance. See your jobber at once about our powerful newspaper mats and mailing pieces.

PRODUCTS WORK WHILE YOU RIDE

Rust Master Chemical Co Chemists

54 CREIGHTON ST., CAMBRIDGE, MASS. SILENT PARTMERS OF MOTOR EFFICIENCY

JUST POUR NO MORE

NO FUSS

NO MUSS



EDWARDS

DENNIS



DEAL PERCH CLEANER

Unmatched.



IF YOUR JOSHER

AUG-EIE BUS-EIE METAL BACK SEALED BEAM LAMP

Original Factory Equipment on Millions of America's Finest Cars

Only Auto-Lite gives you all 6 profit selling advantages

- Auto-Lite Bull's Eye concentrates stray light into main driving beam.
- Auto-Lite Bull's Eye is guaranteed to burn even when lens is cracked or broken.
- Auto-Lite Bull's Eye is sealed tight in press exerting 9000 pounds per square inch pressure to keep out moisture and dust.
- Auto-Lite Bull's Eye "Passing Beam" throws light down and to right where it is best for drivers.
- Auto-Lite Bull's Eye is factory-focused to assure maximum sustained efficiency.
- Auto-Lite Bull's Eye is designed as replacement for all makes of cars and trucks.

Only DuPont ZERONE "ZEREX" this combination of

LEADING NATIONAL MAGAZINES



These "Zerone"-"Zerex" advertisements in the leading national magazines and farm papers will be different! They'll not only help you sell anti-freeze, but they'll urge your customers to see you for a complete cooling system check-up and servicing before the freeze strikes. That means satisfied customers and greater profits for you.

PLUS TELEVISION



We don't have to tell you about the selling power of television. But we do want you to know that "Zerone" and "Zerex" will be right in there pitching—with announcements that stop 'em and sell 'em. And like the magazine advertisements, they'll help you sell more of all cooling system items service, chemicals, parts, and anti-freeze.

PLUS RADIO



of AMERICA



"Zerone" and "Zerex" are the only antifreeze team advertised on a nationwide radio program—the famous Du Pont "Cavalcade of America." That's another reason why "Zerone" and "Zerex" will be on the lips of your customers—another reason why your selling job will be easier if you stock this fastest-selling anti-freeze team.

anti-freezes give you sales pluses! "ZERON

"ZERONE" & "ZEREX"

AMERICA'S FASTESTSELLING ANTI-FREEZE TEAM

PLUS BILLBOARDS



While the ads, television and radio are hitting home, a big, double-billboard campaign will remind car owners it's time to see you about "Zerone" and "Zerex." U.S. Weather Bureau data is used to schedule these billboards so they are up when the freeze is most likely to strike.

PLUS HARD-WORKING DEALER KIT.





Don't fail to get this free business-building kit from your anti-freeze supplier. It gives you a brand-new, eye-catching window display, an up-to-date protection chart with capacities of both new and old cars, and a cooling system appointment book with room to sign up over \$1,000.00 worth of business. Be sure to put this kit to work.

PLUS SPECIALIST PROGRAM



Thousands of dealers have joined this plan that shows how to spot cooling system troubles faster; how to sell more anti-freeze, chemicals, parts, and service. A special window emblem ties you in with powerful "Zerone" "Zerex" advertising. If you haven't signed up, call your jobber today!

AND THE BIGGEST
PLUS OF ALL—
THIS GREAT TEAM OF ANTI-FREEZES

"Made by OuPont"



PRES. U. B. PAT. OFF.

BETTER THINGS FOR BETTER LIVING . . . THROUGH CHEMISTRY



Tops in QUALITY... Tops in SERVICE

Good mechanics everywhere know that the red-and-black Federal-Mogul box contains the parts they need for better engine bearing service.

With more than 7,000 items, Federal-Mogul provides the *complete* engine bearing service: Bearings, bushings, reconditioned and rebabbitted connecting rods, connecting rod bolts and nuts, shims and shim stock.

For quality engine bearings, complete coverage and fast service—ask your Federal-Mogul Jobber!

FEDERAL-MOGUL SERVICE (Division of Federal-Mogul Corporation) DETROIT 13, MICHIGAN





OUTHERN OMOTIVE OURNAL

Covering Automotive Sales and Service

Vol. 31

SEPTEMBER, 1951

No. 9

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THE NAME THAT SIGNALS

PLENTY OF PROFIT

PART OF THE COMPLETE LINE of Sparton directional signals, auxiliary lamps, warning signals and other safety devices that help you tap all the automotive market.

DIRECTIONAL SIGNALS

Approved in most states requiring approval

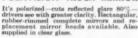




parton Self-Concelling rectional Signal Switch

Series 900, Class "A" New flasher type for left or right turns. Visible 1500-1800 feet in daylight—more at night. Lamp shell and rims bonderized steel. Rustproof, dustproof, shakeproof. For vehicles over 80 inches. Adapts to all trucks and most cars. Essily installed on steering column. Can be cancelled manu-ally without damage to parts if turn is not completed. Meets 1951 SAE specifications and commercial standards. Now fur-nished in all Sparton Directional Signal Sets.

POLAVISION TRUCK MIRROR







ARMORED CLEARANCE LAMP

Special Freenel lens intensifies light, needs only 2-c.p. lamp bulb. Rubber-gasket cushioned. Bonderized. Patent-pending body edge holes provide truck body illumination pattern. Heavy-gauge, stamped steel body.





SPARKS-WITHINGTON

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SPARTON

So-Power Hern

Much in demand by auto and truck owners. All steel construction. Amazing signal intensity. Lightning response. New-type mechanism. Easy installation. No additional equipment

One complete line . . . one reliable source. Makers of quality safety signels since 1900.

in Quality!

Sealed Power MD-50 STEEL OIL RING

The only ring with the Full-Flow Spring Best for Oil Control even in

BADLY TAPERED
OUT-OF-ROUND BORES!

Sealed Power CHROME-FACED RINGS

FIGHT

HEAT, FRICTION CORROSION, ABRASION



00000

SEALED POWER CORPORATION, MUSKEGON, MICHIGAN

Sealed Power Piston Rings

BEST IN NEW CARS! BEST IN OLD CARS!

SPOTLIGHTING the NEWS

Car deliveries, boiled down to what they mean to big and small dealers, might best be summed up by reporting what two Southern dealers had to say last month about their own situations. First, hear the "small" one-"small" in terms of sales volume but more representative of more dealers than the "big" dealer to be quoted later. "My quota now is two cars and one truck a month, compared with about six cars and several trucks a month which I used to get before World War II," said this man handling one of the "Big Three's" lower-priced units. "I've been a dealer for 30 years, and while I know the factory men say that the bigtown dealers are being set up on a quota basis the same way as we are, I can't quite believe all I'm told. If what they say is true, then why is it that while

I can't make a lot of deliveries for lack of cars, yet these same potential buyers can and do go into— (name of city) and get new cars from the franchised dealers?"

It's tough on bigtown dealers, too, if you'll listen to what one of them said. "We're getting 40 higher-priced cars from our factory this month. We got 100 of this type for the same month, August, last year. Our prospect list is having to be worked, however, to move this reduced number, but we still aren't getting enough lower-priced units to

lower-priced units to meet our demand." For this dealer, there is posed the question of how best to continue shaping up his sales force and how to equip his men best to handle the market with the prices of most new cars heading upward as the factories request increases to offset higher materials and manufacturing costs. The proposed raise in federal excise tax from seven to ten per cent will come in also to run the final delivered prices of cars to several hundred dollars above the mid-August quotations.

For garages and dealers' service department, all this spells out a brighter market, if they'll reach for it. Production of cars is expected to drop further the last quarter of this year, with only 1,100,000 set to roll off the assembly

lines. Sell the owner on the fact that in most instances his car will be good for still many more thousands of miles of transportation if it's checked regularly while in for a routine greasing. Production for the quarter ending September 30 was likely to approach the 1,200,000 maximum stipulated by federal regulation.

'52 models will be announced a little later this year than usual, so far as a number of the factories are concerned. Federal controls, materials shortages and, in some instances, a glut of models in the hands of dealers, have all played a part in delaying announcements. Some changes are expected, but most '52 cars will reveal face-lifting changes only, according to advance word. Engines

in the Dodge and De Soto are expected to be around 140 and 160 hp, respectively.

in Oklaho-Bristow ma has a tractor manufacturer of its own. He's Ted Rehbein. With only his mechanic's touch, tool kit and a sharp eye for useful junk parts, he has built eight tractors! He has sold seven, but plans to keep the latest one to farm his ten-acre truck garden near Heyburn, Okla. No. 8 is six feet long and three feet high. It has an eighthp engine and the tractor includes parts of a Plymouth, several Chevrolets and two

Model-A Fords Quite likely, he's not worrying about the future.



"That's what I've got against happy, contented employees!"

"Show-me" technique is not new, but it's not shop-worn, either, if you're to summarize the results obtained at Marbert Motors, Pontiac dealership at Annapolis, Md. Every car that comes into that service shop is checked for 21 simple jobs which it might need without the customer's realizing it. President Meyer W. Gilden says (on page 65) that this alone has meant an increase in customer labor sales volume of 25 per cent. It's the same old story: Business goes where it is invited—not where it has to knock the door down in order to get in. Extra volume, obtained by carefully giving every car a close inspection, may spell out a lot of net profit for the shop in the months ahead.



MARQUETTE MANUFACTURING CO., 307 East Hennepin, Minneapolis 14, Minnesota



Boosting Labor Sales 25%

Every car that comes into our shop gets a full inspection. It may have come in for nothing more than a cross-tire or lubrication job, but our mechanics check through the 21 items listed on our repair orders and note needed corrections.

Defects are called to the attention of the service manager, who personally sees the customer when he calls to pick up his car.

We get a 100 per cent response, I would say, on all minor jobs we recommend through this special inspection service and about a 50 per cent response on major work.

For us it has meant an increase in labor sales volume of 25 per cent. Deferred work provides a future potential source of volume By MEYER W. GILDEN President, Marbert Motors, Inc. (Pontiae) Annapolis, Md.

when the shop runs under capacity production.

During the process of his work, a mechanic will check distributor, carburetor and generator, moving from one item to the next systematically. Though they are paid no special bonus for discovering defects, it is to the common advantage of all our mechanics to be alert to needed repairs, since they are on a 50-50 commission basis, with a guaranteed basic

Having completed his job, the mechanic roadtests the car, looking for any additional items not listed among the 21. The car needing repairs is then turned over to the service manager, who will report the findings personally to the customer. Henry Buser, Jr., our service manager, takes great pains to convince a customer why the defects should be taken care of.

We believe it is the service manager who should do this job because his position carries greater authority, and his recommendations are more credible to the customer than anyone else's.

Furthermore, where a major job is involved, the service manager may learn after discussing it with the customer whether the customer expects to hold on to his car or will shortly be in the market for a new car. This informa-



Giving all cars a 21-item check, regardless of the job for which they were brought to the shop, boosted Marbert's labor sales 25 per cent.

tion is passed on to the new-car sales department.

To convince a customer that recommended repairs are necessary, our service manager compares the kind of performance a customer is getting with the potential performance his car is capable of after corrections have been made. Buser stresses preventive maintenance, savings in money and car wear and tear. He will take a customer over to our series of wall charts of motor and chassis parts and show him what is happening inside his car. He will take him for a test ride.

Let me give you an instance:

Mr. P——, an insurance salesman of Annapolis, brought his car in to have the universal joint repacked. Since we always check and double check for safety, the mechanic found the front tires worn unevenly. New parts were needed: knuckles were worn and knee-action springs needed to be replaced. By chart and car performance, our service manager convinced the customer this work should be done. A \$58 front-end job resulted.

Here's another typical instance. During tune-ups we always check compression and note whether a motor should have new rings or be overhauled.

One day Mr. K—, a surveyor in town, brought his car in for a tune-up. Checking compression, the mechanic observed the motor needed a minor over-hauling. Our service manager pointed out to Mr. K—that his car was using excessive gas and oil and giving only 50 per

cent performance. For one reason or another the customer did not give us the green light on our recommendation.

However, a week later he brought his car in on faulty performance. We found the bearings and piston rings needed replacement. We showed the customer the exact condition his motor was in and sold him a new-motor installation for about \$300.

This is what I would like to point out: If we had given his car a routine tune-up—without motor inspection — he certainly would never have come back to us for car repairs. He would have blamed us for a poor tune-up when his car started acting up. But we anticipated his motor trouble. His return was an affirmation of his confidence in our work.

A car that has come in only for greasing gets a thorough inspection of undercarriage. During a lubrication on Mr. N——'s car our mechanic noticed that the steering rod was bent. On closer examination he discovered that the frame was bent. When Service Manager Buser reported this to the customer, he learned that the customer had hit something but was unaware of the damage he had done. The installation of a new frame on the car came to about \$280.

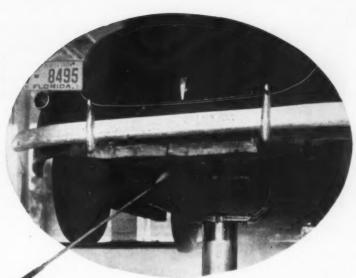
We are not discouraged when a customer fails to accept our recommendations on the spot. We file such cards separately as a future volume potential. Planning shop labor 24 hours in advance as we do, we draw upon these cards when we note any falling off of capacity production. Then our service manager gets on the telephone and reminds a customer of the urgency of carrying out a repair he had talked to him about last time he was in.

He stresses that "a stitch in (Continued on page 132)

"Well, I'll be getting back to the office unless you want me to stay and hear your comments on the engineers who located that water pump where it is."



Controls on a modern steam cleaner make it easy for the operator to do the job quickly and safely and to make additional profit for the shop.



Turning Losses into Profits with

Steam-Cleaning Service

TORNING a losing business into a profitable one, in the automotive service field, may involve nothing more than the careful selection and aggressive promotion of one added service operation.

This was demonstrated in the experience of Ed Mayo, who went into business for himself in Orlando, Fla., after several years with a major oil company.

Mayo took over a service station in October, the threshold of the winter tourist season, and felt he could go through his first six months with some profit. The results were disappointing.

It seemed to him the only way to lick his problem was by coming up with some plan that would bring more people into the station.

About this time a local jobber's salesman entered the picture, accompanied by a representative of a manufacturer of steam cleaners. Steam cleaning as applied to automotive service was not entirely new to Mayo.

After going into a huddle with

By MARTIN G. SILLIMAN

President, Orlando Consolidated Co. Orlando, Fla.

the salesman and the factory man and hearing the complete story of the possibilities of steam cleaning, he began to visualize what it might do for him in the way of attracting customers and augmenting his present volume.

He was surprised at the versatility of the steam-cleaning unit,

Have you ever heard the phrase "steam greasing"? A Floridian who used it in his ads learned that customers came in to ask about it, then bought it.

and it was a revelation to him to learn of all the many profitable service operations that could be performed with it. While all of them did not fit into his service-station picture, he could easily put his finger on several that did. And among other favorable factors, he found that the unit was non-hazardous, portable, could be made ready to go to work in a matter of minutes, and required only a small amount of space.

Mayo found out that with a modern steam cleaner the operator could deliver exactly the right amount of water, cleaning compound, head and pressure through the simple manipulation of easyto-read valve markings. He learned also that the machine could be started up cold and develop a blast of steam at the tip of the nozzle of 212° Fahrenheit in 90 seconds and that this temperature dropped to a sufficiently low point six feet from the nozzle, to make it safe but still efficient, enabling the operator to move the nozzle



When Ed Mayo, shown at right, took over this larger operation, a steam cleaner was one of the first items on his equipment list.

to and from the work, according to the severity of the cleaning operation and the heat desired.

As for uses around a service station, Mayo was able to tabulate the following cleaning operations from information that these men gave him: motors, chassis, driveways, grease pits, hydraulic lifts and white-sidewall tires. All of these operations could be done more quickly, thoroughly, and safely by the steam-cleaning method, as he was soon to prove to his own satisfaction.

It may be noted further that in the case of a car dealer, a steam cleaner is a piece of equipment that can be used in both his service station and repair shop, and is particularly valuable in preparing used cars for reconditioning.

Since many car dealers operate both a repair shop and a service station, it might be well to mention the big saving in the mechanic's time that can be effected by having a steam-cleaning unit in the shop. A national timestudy survey revealed that one of these machines would save 24 minutes per hour of a mechanic's time for productive labor, as the cleaning of dismantled parts from units such as transmissions, rear ends, etc., would be done in a matter of minutes and the re-assembling of these units completed in less time, since the component parts were cleaner and easier to handle. The fact that steam-cleaned parts were easier to examine for defects to determine usability was also a big time saver.

This same survey showed a saving of better than 40 cents on every labor dollar spent. But even if we assume that the 40-cent figure is too high and compromise on a more conservative one, say 25 cents, the savings when carried on to monthly and yearly totals assume very substantial proportions.

But to get back to Ed Mayo and his steam-cleaning story. Of course, he bought a steam cleaner; his investment at that time was approximately \$400 for the machine itself.

Used Daily Advertisement

And here's a most important point. When it was delivered, instead of pushing it back into a corner of the wash rack until someone came in and asked him to do a steam-cleaning job, he 'phoned the local newspaper, asking them to send an advertising representative around to see him. As a result, he bought an ad in both morning and evening papers at a price of 66 cents per day, and wrote his own copy.

In preparing this advertisement, Mayo hit on a phrase that proved to be the password to big steam-cleaning volume. He asked the motoring public to come in and have their cars "steam greased." Of course, no one had ever heard of "steam greasing" and people began to come in and ask what it was.

This was the opening Mayo and his crew were waiting for.

The first sales step was to take the car owner around to the rack and show him the new equipment just installed to do the "steam greasing" job. Then followed an



explanation of how the car was put on the lift to make all the underneath parts accessible, and then thoroughly cleaned with hot water, steam, and a special cleaning compound. The customer was also told that this was a real cleaning job, since it removed all accumulated dirt, excess grease, road oil and corrosion from driving in salt water at the beaches. It was emphasized that in so doing the operator cleaned all the lubrication fittings on the car, thus preparing them to receive the clean lubricant needed; and that this was then applied strictly in accordance with the car manufacturer's specifications and recommendations.

The proof of the efficacy of this sales story was soon apparent, as Mayo was "steam greasing" cars by appointment within two weeks and had a comfortably long waiting list. The cash-register key for the lubrication department took on a new shine and quit sticking from disuse. Gailonage started to pick up and all departments began to show signs of rejuvenation.

The purchase of a steam cleaner (Continued on page 118)

It's Easier to Keep Old Customers

By Jack Bannick

BOTH have long memories—customers as well as ele-

A customer wrote: "The repair shop I patronize doesn't cater to people in overalls. (I always wear overalls in my work.) Yesterday I called for my car—in overalls—and stood at the desk exactly 49 minutes. During that time I was passed by and pushed aside by two service salesmen (!).

"While I was waiting, Mr. Doe called for his car. Five service men waited on him, breaking their necks to be nice. He was a big shot—I'm just a working stiff, but I have dollars to spend, too; only from now on I'll spend them elsewhere."

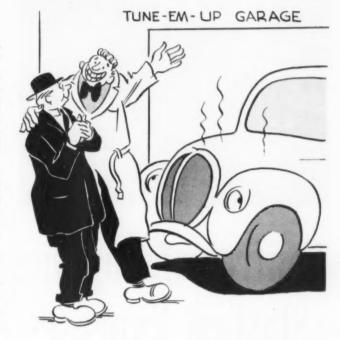
After 13 years as customer relations manager for Packard Motor Car Co., I have resigned for reasons of health. The centralization of customer problems in my hands for 13 years has given me an extensive and exact knowledge of what is required to maintain satisfied customers. In this series of articles I hope to pass on to you this knowledge, which will be helpful to all who are in the business of selling service and repairing cars, whether in the shops of authorized car dealers or of independent garages.

This letter from a customer is worth thinking about:

"I took my car to the shop at nine this morning, to be ready for my pick-up at three because I was going to a club meeting. When I came to pick up the car I was dressed in white shoes, white gloves and a white dress. When I got out of the car at the club, the palms of my white gloves were black, there was a gob of grease on the heel of my white shoe and a black, greasy streak across the back of my dress."

She blew her top all over the place, not only to the members of her club but to her neighbors. The service man who left grease inside that car dropped a pebble of dissatisfaction in a pool.

Remember when we were kids and threw stones in ponds? First a small ring spread out from the



center, then a larger ring, then more and ever larger rings. A dissatisfied customer is like that. We lose not only his or her future business, but that of her friends. When the name of our repair shop is mentioned, someone will say, "Oh, I know about that place." Then the story of the grease will be told and a comment added, "Better stay away from that shop."

If the service manager had apologized and paid the cleaning bill, she might have got over her "mad"; but he didn't. And he lost a lot of business, having lost sight of the fact that it is easier to keep old customers—and more profitable—than it is to get

This points up the truism that good customer relations mean satisfied customers. Repeat business is possible only through satisfied customers. Too often we in the automotive sales and repair fields forget this—and we lose money in proportion to our forgetfulness.

He Knows What He's Saying!

The author is well acquainted with customer complaints and what to do about them. For 13 years he was customer relations manager for Packard Motor Car Co. This article is the first in a series of three he has prepared on things that cause the greatest dissatisfaction among customers and how a shop can avoid these costly errors.



Control of Supplies Slashed Expenses

By M. M. Wilcox Assistant Editor

Would you like to reduce one of your operating costs by

Shug Glenn Buick, Inc., Lexington, Ky., was able to do that recently. A program for more effective use of shop supplies has been the latest part of the firm's continuing efforts to keep overhead expenses in line.

"We thought we were being careful about our supplies until the bills came in for a recent month and we found we had spent about \$900, three times as much as we usually spend in a month," said L. M. Blanche, service manager.

"Of course, we had a 90-day supply of many items as a result of those heavy purchases. But when we saw that \$900 on the books, we decided we should set up a system for keeping closer

check on supplies."

During the first month there was a reduction of 30 per cent in the amount of shop supplies used.

"We formerly kept all shop supplies—for the mechanical work, paint shop, machine shop, makeready and other departments—in the machine shop," Blanche said. "Whenever a man wanted a grinding disc, chamois or some rags, he went by and asked for them. We didn't keep any close check.

"Sometimes we noticed that the men were careless about certain items. One man, I remember, got into the habit of putting on a new buffer every time he polished a car."

Blanche had all shop supplies moved from the machine shop to the parts department. They are issued to mechanics and helpers Johnny Rice, a body man, turned in the worn grinding dise to get a new one from Walter Elsey, the parts man who keeps shop supplies. Simple checks like this have cut supply expense 30 per cent.

by one of the parts men.

"Now when a man wants a buffing pad or some similar item, he has to turn in the old one when he gets it," Blanche said.
"When we first started this

"When we first started this policy, some of the men weren't too happy about it. But as soon as they got used to the change, they agreed that it was much better than the old system.

"We want the men to have everything they need to do a good job and do it quickly. We're just trying to avoid loss and waste."

All supplies used on a job are listed on the back of the repair order covering that job. Supplies for both customer and internal labor are listed so they can be charged off to the proper department.

At present, weekly tabulations of supplies used are made from these notations for inventory pur-

"By the time this system has been in effect three or four months, we believe these tabulations will give us a pretty good idea of just what our turnover is for shop supplies," said Blanche. "Then we plan to adjust our stock of supplies so we have a 30-day inventory and place an order once a month."

Having one man in charge of issuing all supplies is one prime factor in controlling this expense. The other is to have one man in charge of purchasing.

Around March 1, Blanche began signing purchase requisitions for all supplies. This has helped keep the supply inventory balanced and prevent the men in different departments from ordering too heavily in certain items.

The tabulations now being made from the notations on the back of the orders will help him to do a better job of forecasting needs and balancing future orders, Blanche believes.

This extra care in handling supplies will save the company about \$90 a month, judging by present indications. That's almost a third of the amount that has been spent on supplies in an average month by this establishment.

Bearings, Blisters and the Good Old Days

The new-fangled Regal and two-cylinder Reo needed service and it was up to the old-time mechanic to pitch in and correct the trouble.

> By C. N. McCAIN Bridges Motors, Inc. (Packard) Greenville, S. C.

Do you ever see a picture of an old "horseless carriage" and think about what a long way the automotive industry has come?

Then let's sort of relive a day in the repair shop back at that time:

Early in the morning a customer complains that the motor in his Model 10 Buick is pulling "jerky." The boss calls a mechanic and tells him to turn the motor over with the hand crank while he feels for valve clearance. Sure enough, the rocker on the No. 3 cylinder exhaust valve has 'way too much clearance and most likely that means there's a flake of carbon lodged right there under the valve.

So the mechanic backs out a threaded retaining ring, takes the rocker off its shaft and removes the valve cage, valve and spring as a unit. Removing the valve spring, the mechanic scrapes away the carbon flake, polishes the seat lightly with fine compound and reassembles the job. About 30 minutes completed the repair, for in this case the cage was not stuck in the cylinder head.

Meantime, a one-cylinder Cadillac is driven in, with an engine that sometimes knocks the crank right out of your hand. It has a safety side to prevent kicking, so we know the safety is disconnected or the timing-contact key and spring are worn, causing early contact. Finding the safety okay, the worn contact parts were installed in about one hour-including removing and replacing the dust pan.

Here is a two-cylinder Reo with a noisy transmission-all planetary transmissions were noisybut this one had a growl that doesn't belong there. Going into detail on this job would take too long but we must tell you that the new bronze bushings were scraped to fit with hand scrapers. In that day, mechanics boasted about the fine steel in their bearing scrapers. But a fellow always finished a transmission-rebuilding job with plenty of water blisters.

Frank draws a Model R Ford timer job. This timer was placed right down between the flywheel

and the rear end of the aluminum crankcase. Each timer wire had to be placed just so, to keep it away from the open flywheel. And was that close quarters!

A colored chauffeur drives in with a shiny red Pullman-not the railroad variety-and his motor knocks badly when pulling a hill. In those days of Ethyl-less gasoline, a very small amount of carbon would cause a heck of a knock. And with non-removable heads it was necessary to pull the cylinders and scrape the carbonmore scrapers, long handled-or burn it out by the oxygen process.

The boss is very proud of his new carbon-burning outfit so he does the job himself, charging \$1 per cylinder. First the gasoline was cut off at the tank and the motor ran till it stopped, to lessen the danger of fire. Then the spark plugs were taken out and the motor turned over until one piston reached top dead center with both valves closed. A small amount of kerosene was squirted into the cylinder and lighted with a match. Then a small brass pipe was inserted and oxygen slowly fed the flame. A quick, intense heat burned out the carbon in a matter of seconds.

The transmission gears for the new-model Regal have just come in by express. This transmission is mounted just ahead of the differential assembly, so the whole

(Continued on page 136)

This is the building where Henry Ford assembled his first gasolinedriven buggy. Some of its features suggest the early repair shop.



\$10 Brings Back **Lost Customers**

A cash bonus to any employee who brings back a former service customer has been a help in increasing volume 30 per cent.

By Stuart Covington

\$10 BONUS for all employees who bring back "stray" customers has zoomed repeat business at the shop of Dees Chevrolet Co., Biloxi, Miss., to 86 per cent of the total shop volume, according to Sales Manager Dennis Harris.

The bonus and other sales stimulants employed the year-'round by this 25-year-old dealership increased over-all volume 30 per cent in 1950, when over \$2,000,-000 worth of business was rung up in all departments.

"If a regular service customer has failed to visit our shop for 60 days or more, or is definitely trading at another shop, we classify him as 'lost,'" Harris said.
"Any employee bringing him back for service work of any sort receives \$10 as soon as our first parts or labor sale is made to that person.

"If the driver of a competing make of car is brought back after as long as three years, we still consider him a 'returnee' and pay off accordingly.

"We offer this bonus because we feel that the average customer is worth \$150 a year to us. The \$10 we pay to get the customer back is well spent, in our opinion."

Originated in 1949, the bonuses have produced good results, Har-

When an employee succeeds in persuading a former customer to give Dees Chevrolet Co. another chance, Harris, General Manager Beverly Briscoe or some other official of the firm is on hand to welcome the car owner "back

into the fold."

This officer chats briefly with the returnee and attempts to learn why the motorist quit doing business at Dees Chevrolet Co. Usually, Harris reported, this greeting wins the motorist as a permanent customer there-

"Biloxi is a comparatively small city," Harris said, "and some member of our force at one time or another sees any customer or former customer of ours. There is our contact.'

Sometimes an employee goes out voluntarily to contact a "lost" customer and sometimes he is appointed to make the visit. either event, he receives the \$10 bonus if he is successful.

"The person from the dealership best acquainted with the lost customer usually is selected to go," Harris explained. "Sometimes this is a salesman, sometimes a mechanic that the person has confidence in and occasionally someone from another depart-

"The plan of approach is very open and plain-'Just why aren't you trading with us?' Usually the reasons are small, but occasionally they are not. Sometimes they are justified and sometimes there has been only a misunderstanding. But the reason, once in the open, can be ironed out and the customer brought back. They are easier to hold then, for they have learned to let you know openly and quickly when something is wrong.

"Back in 1948 we lost a fleet operator. His repair and parts amount ran about \$350 a month and new-car sales to him were about ten a year. He suddenly went to another dealer and another make of car. In 1949 one of our salesmen found out that he thought we had not given him his share of cars during the postwar shortage. He went to some-(Continued on page 134)

General Manager Beverly Briscoe (right) doesn't delay in paying the bonus. As soon as the first part or service sale is made to the "returnee," the employee who brought him back receives a \$10 bill.





This Salesman Doesn't Sell "Service"!

By Baron Creager Southwestern Editor

JOHNNY Grossman, service salesman, says he isn't really selling customer labor and replacement parts and therefore he isn't selling service.

What he sells is personal attention. And, although no shop ticket ever shows an item of "personal attention," that, according to Johnny, is what every customer wants and expects when he drives in, and pays for before he drives away.

So patient, personal attention is what every owner gets from Grossman. Not just during the conversation that determines what goes on the ticket. But on through the day, with a personal inspection of work on every car for which he has written a ticket.

"You can see it work," explains Johnny, "almost any place where people spend money. Take a restaurant, for example.

"If a man knows that some one person in a certain eating establishment can be depended upon for some little extras in the way of personal attention, that's where the man eats. The food in the place across the street may be better, but that doesn't get his business.

"As I see it, that's the way it is with a service salesman. He is in much the same position as a doctor, who conscientiously looks after his patients. In cases where there may be complications the doctor calls his patient to see how the patient is getting along.

There are cases like that in this business, too. When I handle such cases I keep a list of them. Such as overhaul jobs, and the common complaint that results from a fine particle of dirt in the carburetor. In the latter case the car may be running great when it leaves here, but the trouble may show up again. So I keep a list of such customers and call them a few days later to see if the car's all right. I call a few days after an overhaul job goes out, that I handled, too. Customers appreciate that interest."

In spite of the notations on the repair-order form, Service Salesman Johnny Grossman will insist he doesn't sell service. What he does sell can be more important!

Grossman's boss, Ralph Dosher, who is service manager of Triangle Motors of Dallas, Texas, Oldsmobile dealership, says Johnny will not sell as much service as some salesmen, but that there are seldom any complaints from any of Johnny's customers.

This is understandable by the manner in which Johnny sells personal attention on the service floor. And this chronicler had an opportunity to watch Johnny at work under conditions trying to some degree, and without the man who sells personal attention having any intimation that he was being watched.

Chose Busiest Hour

Selecting the busiest hour of the morning, which was early, we drove in at the service entrance of Triangle Motors. There were three receiving lanes, and we took the middle, empty at the moment.

"Who," we asked when approached, "is Johnny?"

"Johnny Grossman? That's him right over there. He'll be with you in just a minute."

But it was nearer 15 minutes, for Johnny was occupied with an apparently highly nervous, somewhat displeased lady customer and her new car. We learned later the speedometer showed a thousand miles, so it was all warranty. But Johnny, taking plenty of time, approached the transaction as if he were writing up a wreck.

The lady owned a slightly high, penetrating voice, carrying on a sustained note of irritation. One got the impression she was looking for cause to fly into a tantrum as, gesturing and rattling, she led on a tour of inspection. But Johnny Grossman was imperturbable, busy making notes and listening, as if that were the one and only automobile to be serviced in that dealership that entire day.

Finally, however, he came around to us and we made introductions.

"This car," we told him, "is all right. Nothing wrong with it at present, so, frankly, I didn't come in this morning to spend any (Continued on page 136)

Ads in a Negro theater have brought many paint and body jobs to J. D. Phelps, shown here giving an estimate on a firstquality baked-enamel job to one of his Negro customers.

By Ross L. Holman

Ads for Negroes have helped in



Building Up "Quality" Trade

SURPRISING as it may seem to some shop operators, J. D. Phelps of Industrial Painting Co., Nashville, Tenn., gets some of his most quality-conscious customers among Negroes.

Most capable Negroes are now making money and many of them have good cars. Phelps found this out when he began running an ad in a colored movie theater.

Rightly or wrongly, many Negroes have the feeling that it is much harder for them, as Negroes, to get fair adjustments on service jobs that don't stand up than for white car owners to get adjustments. Phelps emphasizes his impartiality for all it is worth with illustrated ads on screens of Negro theaters. He believes it is a line that other service garages might well play up.

The first result of these weekly ads was the patronage of some Negro physicians. They were so pleased with Industrial Painting's service and the fairness of its adjustments that they soon were recommending it to others.

The response from the Negroes has been so gratifying that the colored-movie ad runs continuously while all other Phelps movie and printed promotions are

being run periodically.

As evidence of the confidence he has developed among colored car owners, Phelps told of a Negro who drove in a Lincoln one day. He wanted a baked-enamel job and some other work totaling \$100. Leaving the car, he started off without waiting for an estimate.

"Wait, don't you want us to figure the price on this work?" Phelps asked.

That attitude is typical of many of Phelps' customers.

Not long ago a man drove a battered car into the shop and asked Phelps to make an estimate on the cost of repair. "This is an insurance job," he explained. "I have to get three estimates on it before I can have it fixed and the insurance company won't pay any more than the lowest bid. But I don't care how low the other estimates are, you are going to get the job."

That expression of loyalty touched a tender spot in Phelps' heart and it was a double-barreled testimony of the quality of his work and the way he has held the line on a pricing system that has enabled him to give good service and keep his business on the sunny side of solvency.

"That man was willing to pay the difference between my price and a competitor's lower bid," he explained, "because his past experience convinced him that my work would give him as much lasting service as his money would justify. He wasn't certain the competitor's lower-priced job would stand up like mine."

Phelps had a whale of a time building up his volume on his scale of live-and-let-live prices from which he was often tempted to budge. But he has held the line until now he has a solid core of patronage, most of whom don't even ask for an estimate but tell him to give the vehicle what it needs and send them the bill. He has three prices to fit different baked-enamel services — \$49.50, \$64.50 and \$84.50.

"I stand back of these prices with a 12-months' guarantee," Phelps said. "I have recently painted several '49 and '50 cars.

(Continued on page 132)

Singers and Sluggers, All Help Sell Cars





Car Salesman Don Whitney has time off from work each day to broadcast his radio program.

Besides bringing in trophies and publicity in the sports pages, the softball team was directly responsible for the sale of 25 cars last year to players on other teams, reported E. C. Burnett (in jacket).

In the little Delta cotton town of Blytheville, Ark., Burnett Hudson Sales has, for several years, remained close to the top in car sales for its potential in a five-state area. E. C. Burnett, owner, has a simple explanation for his success.

"We add personality to sales. We have a definite program for it, including our setup for sales, advertising and public-relations activities. Into every medium through which we promote sales on both new and used cars, we inject the personality of the individual salesman and the organization as a whole."

Burnett says that when he employs a new salesman, he values personality above actual experience in selling cars. "We can train a man with an outstanding personality to sell."

Typical of the salesmen he likes to employ is Don Whitney, a towering man who has made a hit as a hillbilly broadcasting artist.

As one of the top salesmen employed by Burnett, he is given time away from his job each day to appear on the radio program. Burnett cashes in on the connections

By S. W. Ellis

tion by promoting Whitney's personality as the hillbilly performer who sells cars. Whitney's photographs are shown prominently about the sales room and are distributed to prospects.

Whitney sells cars. He is a good salesman, trained in the Burnett organization and backed with all the cooperation that Burnett can give. An example of this cooperation is the use to which Burnett puts the post cards picturing a Hudson car, furnished by the manufacturer. In his own handwriting, he pens a personal message that introduces the salesman to a prospect: "Mr. Brown:

"This will introduce Don Whitney, with Burnett Hudson Sales. Any courtesy shown Mr. Whitney will be appreciated.

"This card is worth \$25 to you on a new Hudson.

"Sincerely,
"E. C. Burnett."

Another sales stimulus that Burnett uses for his men is giving each a bonus car to sell every week. He picks out a certain car on the lot to be delegated to a salesman, which carries an extra \$25 bonus if sold that week. Each of the four salesmen get a bonus car every week. If the car is not sold by the end of the week, it is given to another salesman to try. Sometimes the salesmen swap cars unsold at the end of the week

Burnett himself manages newcar sales, and he is a bundle of energy who keeps his men pepped up. On his sales force he uses many of the tactics that he employs as manager of his softball team—the Burnett Hudson Pacemakers.

The softball team he sponsors gets more publicity for his firm than any other form of advertising and also results in many direct car sales. To illustrate, last year he took his team to the state tournament. Here he sold 12 new cars to players on different teams, besides 13 used cars.

The green-and-white uniform, which Burnett buys, together with all other team equipment, is also under typical promotion. To keep people who come into the (Continued on page 123)



NEWS BRIEFS of the

Grove Succeeds Slack For Willys Sales

Howard P. Grove has been elected vice - president in charge of sales of Willys-Overland Motors, Inc., succeeding Lyman W. Slack, resigned.

Grove joined Willys-Overland last year and in March, 1951, was appointed general sales manager. He previously was with Hudson Motor Car Co. for 13 years and with the Pontiac Division of General Motors for ten years.

Slack resigned to give his full . Spencer of Newport News attention to his automotive dealership in Portland, Ore., according to Ward M. Canaday, Willys chairman of the board.

Caviness Named at Ocala

Rupert Caviness of Caviness Motor Co. recently was elected president of the Ocala, Fla., Automobile Dealers Association. W. J. Rodgers was named vice-president and O. A. Lowe was named secretary-treasurer.

Heads Dealer Group

H. M. SPENCER of Ward Pontiac Sales, Inc., Newport News, Va., has been elected president of the Newport News-Hampton Automobile Dealers Association

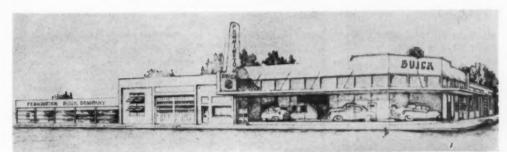
George Shields of Shackelford Auto Co., Newport News, was named vice-president. W. H. Bowditch of Bowditch Motors, Inc., Hampton, is secretary-treasurer of the association.

Sutton Motor Co., Chrysler-Plymouth dealership, is adding both beauty and efficiency to "automotive row" in Beaumont, Texas, with this building, estimated to have cost \$150,000. These photos show the exterior and three views of the service department. The building, L-shaped for better arrangement of departments, contains 30,000 square feet of floor

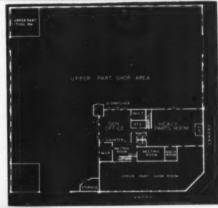
space. One of the unusual features is a pitched roof over the service area that permitted installation of 64 glass skylights, flush with the roof. The firm was founded by C. D. "Billy" Sutton in 1939, John R. "Jack" Sutton and Miss Mary L. Sutton, his brother and sister, are associated with him. About 30,000 attended the three-day formal opening, held recently.

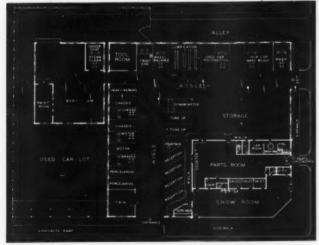


AUTOMOTIVE ______INDUSTRY



Construction is nearing completion for the new home of Pennington Buick Co., Galveston, Texas, shown above in the architect's drawing. The main building is 155 feet wide and 150 feet deep. It is situated at 23rd Street and Avenue M. Drawing at right shows the plan of the second floor and the floor plan of the first story is below. Facilities for used-car sales and storage adjoin the main building. The plant is of holow tile and stucco, reinforced steel and concrete. "The very latest features in service equipment and facilities are being installed to make this plant one of the most complete and efficient in the South," said President E. J. Pennington. The firm expects to occupy the new facilities sometime this month.





BOP Division Purchases Plant Site in Texas

THE Buick-Oldsmobile-Pontiac Assembly Division of General Motors Corp. has announced the acquisition of a 255-acre site between Fort Worth and Dallas, Texas, for a possible future manufacturing or assembly operation.

The land lies in Tarrant County at the eastern edge of Arlington on U. S. Highway 80. adjacent to the Texas and Pacific Railroad.

John F. Gordon, vice-president and group executive in charge of body, hardware and assembly divisions, stated that future plans for use of the property depend upon availability of materials. Presented in condensed tabular form here are the data rounded up by General Manager Walter C. Mallory in a survey of the membership of the Florida Automobile Dealers Association recently on wages, hours and working conditions of employees. The association is one of the oldest in the United States, having been incorporated in 1920.

Missouri District Meetings Get Under Way Oct. 2

The first in a series of district meetings of the Missouri Automobile Dealers Association will be held at Gallatin Oct. 2, it has been announced by President Don E. Fitzgerald.

Other meetings for the week will be in Kirksville. After a week's delay for the annual NADA membership campaign, meetings in other districts will be resumed. Fitzgerald said.

4,000,000th Pontiac Rolls Off

The four-millionth Pontiac came off the Pontiac Motor Division assembly line August 11—two and one-half years after the three millionth was turned out (1949). It took nine years to produce and sell the first million (1926-35).

"Looking Ahead" on page 166

Paul E. Gies is now eastern branch manager of Ford Motor Co.'s dealer development office. He will supervise dealer development in the seaboard states from Maine to Florida for both Lincoln-Mercury and Ford Divisions. He formerly was with Ford's field sales organization, for a time in the Southeastern territory.



SURVEY WAGES — HOURS — WORKING CONDITIONS

Number of dealers who answered survey: 252

Number hours:	40	44	441/2	45	46	461/2	47	471	2	473/4	48	49
Number dealers:	7	49	1	9	4	9	4	2		1	26	23
Number hours:		491/	2 50	501/2	51	52	53	54	55	57	60	65
Number dealers:		8	47	3	4	5	1	28	8	3	7	1

- (b) Overtime:
 - 107 dealers pay overtime.
 - 113 dealers do not pay overtime.
 32 dealers do not work overtime.
- 32 dealers do not work overtime.(c) Overtime begins after hours listed:

Number hours: week: 40 41 45 47 58 50 50½ 52 5

Number dealers: 22 12 3 1 5 14 1 2

Number hours: day: 8 8½ 9 9½ 10 (133 did not answer)

Number dealers: 14 4 31 2 3

2.—Holidays:

Observed with pay:

- 6 holidays: 48 dealers observe.
 16 worked: 30 pay straight time, 3 flat rate, 7 time and half 8 do not work.
- 5½ holidays: 2 dealers observe.

 If worked: 1 pays straight time, 1 double time.
 - 5 holidays: 88 dealers observe.

 1f worked: 46 pay straight time, 15 time and half, 1 double time, 26 do not work.
- 4½ holidays: 1 dealer observes. Does not work.
- 4 holidays: 32 dealers observe.
 If worked: 20 pay straight time, 6 time and half, 6 do not work.
- 3 holidays: 5 dealers observe. If worked: All 5 pay straight time.
- holidays: 1 dealer observes. If work, pays straight time.
 holiday: 1 dealer observes. Does not work.

Observed without pay:

- 6 holidays: 21 dealers observe. 5 pay straight time, 2 time and half, 6 commission basis, 8 do not work.
- 5 holidays: 34 dealers observe.
 16 pay straight time, 1 double time, 1 time and half,
 5 flat ryte or commission, 11 do not work.
- 4 holidays: 9 dealers observe.
 If worked: 8 pay straight time, 1 commission.
- 3 holidays: 8 dealers observe.

 If worked: 4 pay straight time, 3 commission or flat rate, 1 does not work.
- 2 holidays: 1 dealer observes. Does not work.
- 0 holidays: 1 dealer observes no holidays—pays on 50-50 basis.

3.—Vacations:

- 178 dealers give vacations with pay
- 4 dealers give vacations with pay to salaried men only
 - 68 dealers give vacations without pay
 - 2 dealers did not answer

(Continued on opposite page)

(Continued from opposite page)

4.—Employee Facilities:

Number of dealers who furnish all or part of coveralls:

- 35 dealers furnish 100%
- 13 dealers furnish 50% 6 dealers furnish 33%

Number of dealers who do not furnish any part of coveralls: 198

Number of dealers who pay all or part of mechanics' laundry:

- 37 dealers pay 100% 1 dealer pays 75% 20 dealers pay 50%
- 1 dealer pays 30% 1 dealer pays 15% 1 dealer pays 10%

- 1 dealer pays 40%
- 1 dealer pays \$1.00 per week.

Number of dealers who pay none of the cost of laundry: 189

5.-Unions: (No firms have unions)

6.-Wages:

Method of pay to mechanics:

			OUR							
Straight time:	\$.80-1.00	.84	.90	1.00	1.10	1.15	1.20	1.00-	1.35	1.25
Number of dealers:	1	1	1	10	2	2	2	5		18
Straight time:	\$1.25-	1.50	1.30	1.35	1.50	1.05	-1.25	1.98	1.50	-1.75
Number of dealers:	1	5	3	1	. 8		1	1		1
Straight time:	\$3.00	3.50	1.60	1.80)					
Number of dealers:	1	1	1	1				1		

Straight time:	\$60	WEEKI \$62.50 pl		\$55 plus	40% over \$110
Number of dealers:	2		1		1
Straight time:	\$40	plus. con	ım. \$60-\$	65 \$45 pl	us 10%

Number of dealers: 2

Flat rate: 100% 60% 55% 52% 50% 48% 45% 50-60% 50-40%

Number of 16 3 136 1 dealers: (1 dealer guarantees \$44 on 50% basis, 4 guarantee \$50 on 50% basis pays 50% on work over \$100 per week.) 72 dealers guarantee weekly earnings-97 do not guarantee earnings.

7.—Customer labor charges:

Amount of charge:	\$1.50	1.75	2.00	2.25	2.50	2.75	2.90)
Number of dealers:	1	1	15	10	105	7	1	
Amount of charge:		\$2.50-	3.00	3.00	3.50	2.75-3	.00	2.25-3.00
Number of dealers:		5		93	6	1		1
Amount of charge:	\$3.0	00-3.50	4.0	0 less	25%	2.50-	3.75*	
Number of dealers:	_	2	_	1		1		

* \$2.50 store hours; \$3.75 after hours.

AC Spark Plug to Build **Gunsights for Planes**

Tooling is under way OOLING is underway for the gunsights for use on fighterplane machine guns, George Mann, Jr., general manager of the AC Spark Plug Division of General Motors, announced last month. During World War II, the division produced approximately 33,000 gunsights.

"Every effort is being made to get into production as soon as possible on the current order from the Air Force," Mann said.

Dealers Lend 5.700 Cars For Student Training

66A UTOMOBILES valued at approximately \$11,000,400 were provided by automobile dealers to high schools during the 1950-51 school term for use in

We notice Installment payments have been extended to 18months on used cars by our government. We are glad to extend those terms to our customers." however, in making your obligations, our edvice is to pay as much down as you can afford and pay the balance off as promptly as you can as this will save you mensy on your purchases. Do not buy what you do not need just because you can buy it on so-called "easy credit terms." The best and cheapest plan is to pay all cash. The next. best plan is to pay as much as you don as down payment and take as little time as per sible to camplete payment in full. This is just plain HORSE

John Smith Co., Chevrolet dealer-ship at Atlanta, Ga., ran this as part of an ad in the newspaper want-ad columns right after Regu-lation W's terms were eased from 15 to 18 months. "The easiest way to pay for anything is cash," commented Wesley O. Slate, Jr., of the company, which entered the transportation field in 1869 by handling wagons and harnesses.

practice driving," announced James J. Newman, chairman of the Inter - Industry Highway Safety Committee and vice-president of The B. F. Goodrich Co.

"Since cars are one of the major items of expense in conducting high school driver - education courses." Newman stated. "the loan of approximately 5,700 cars for behind-the-wheel instruction is an outstanding civic contribution on the part of dealers. This contribution, representing a \$2,-500,000 increase over the 1949-50 school term, coupled with the increased public and school interest in high school driver education programs, accounts for much of the gain made nationally in this important phase of traffic safety work."

(Continued on page 166)



"Blitz" Training Pays— Both Now and Later

By Beatrice Miller

A "BLITZ" training program to make apprentices immediately productive while they are learning on the job was introduced throughout the organization of Phelps-Roberts Corp., Washington, D. C., the first of the year.

ton, D. C., the first of the year.

Planned to meet the increasing manpower shortage, the steppedup, intensified training concentrates on developing specialized skills in shorter periods of time and advancing an apprentice from

simple to more intricate processes.

With periodic pay increases as skills are mastered, an apprentice machinist can now earn within 18 to 20 months at Phelps-Roberts journeyman's wages of \$1.50 per hour or \$75 for a 48-hour week—wages formerly reached only after four years of training.

Blitz training is designed to cut down turnover and make available specialized skills and increased production for immediate and



Crankshaft grinding (above) and truing a shaft (below) are just two jobs apprentices are taught at Phelps-Roberts in Washington.



profitable use by an employer.

Blitz training, a streamlined National Apprenticeship Training Program with non-relevant skills left out, but retaining a mappedout plan of procedure and goal of all-'round skilled worker, may be adapted and tailored to the needs, rates of pay and local conditions of any garage, dealer or jobber.

"No employer stands to lose a thing by this blitz training. If an apprentice he has trained for two months at pin fitting or cylinder boring or brakes or valves leaves him, he is not taking a loss," said Robert E. Phelps, secretary-treasurer of Phelps-Roberts. man has produced profitably during those two months."

Recalling the high labor turnover in the shops during the last war, Phelps pointed out that the incentives of accelerated learning. faster returns of high pay and an organized training setup providing a goal of completion to those who stayed on would reward an employer with higher production, higher employee morale and reduced turnover.

He cited an experience in his own machine shop. After training at pin fitting for two months, at piston expanding for two months and piston grinding for two months, one employee is now on reboring after a six-month employment period. He has had one pay increase and will be due for another as soon as reboring has



Fred Carroll tests a distributor for regularity of fire, cam angle and governor advance with the help of Frank Stauffer, shop foreman.

been mastered sufficiently under the program.

Another apprentice with Phelps-Roberts four months has learned pin fitting and piston expanding; a third apprentice is becoming proficient at pin fitting during his second month. Individual aptitudes and individual training set the pace.

"Our plan is to train these boys at successive skills if they stay on with us. Pay increases are not automatic. Skill has to be proven before they are advanced. We hope to make all-'round skilled craftsmen of them," explained Phelps who pointed to the company's success in retaining almost 100 per cent of the apprentices (50 per cent of the entire staff) they have put through the formalized program under the D. C. Apprenticeship Training Council over the last seven years.

"It is highly inadvisable to keep a man at one operation beyond the learning period because he has become very profitable to an employer doing it. The allround skilled employee who can hold down all operations in a machine shop or repair station is the most valuable and most profitable employee a business can have.

Phelps suggested a blitz training program in special skills that another machine shop might find suited to its needs:

1. Valve work.

2. Pin fitting.

3. Resurfacing operations.

He suggested two- to threeweek training periods spent at the various operations under valve work as:

Removing and reinstalling valve guides.

Refinishing valve seats.

Refacing valves.

Cleaning operations. Assembling and disassembling. Setting of valves.

(Continued on page 122)

Ellis Shortt, first to complete apprenticeship training, is taught line boring of bearings by S. Adams, a well-experienced machinist.









Grocery-store-type baskets like the one above have speeded up collecting merchandise from bins at United Auto Supply. At top left the old system is illustrated and, at bottom, the new. The firm's new Dallas, Texas, home shows in the top picture.

Using Baskets Produced Speedy Order-Filling

FOR saving time, steps and tempers and reducing damage to merchandise dropped in the routine of filling customer orders, the United Auto Supply Co. of Oklahoma and Texas has adapted the grocery-store shopper's basket.

Manuel Bloom, manager of the Dallas, Texas, store, says steel grille baskets are now in use in all four of the firm's stores and that the practice has facilitated and speeded up the task of collecting merchandise from a number of the bins for a customer's order.

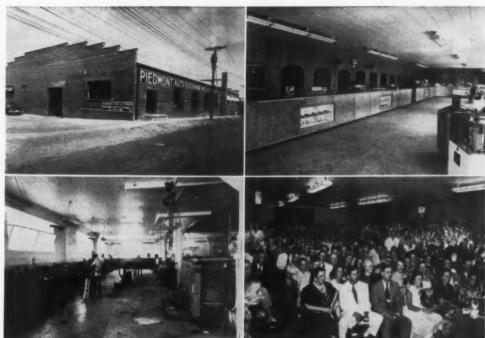
These baskets so familiar to food shoppers are of the type that telescope together in a minimum of space when not in use. For the automotive jobbing business they were, so far as Bloom knows, first introduced in the firm's Oklahoma City store. Located directly across the street from that United store is the plant of the basket manu-

facturer, which explains the idea for this use.

Seeing the baskets so often, Ralph Bloom, Oklahoma City manager, asked the manufacturer for one basket on trial. The result was that baskets were put in use in all company stores, including Fort Worth and Houston, Texas, in addition to Oklahoma City and Dallas.

United Auto Supply recently opened a new Dallas location which provides 15,000 square feet of floor space compared with the 9,000 feet available at the former location, which was occupied for about 20 years. The new building, costing \$95,000, has twice as much shelving space, a 70-footlong counter, 1,500 square feet of customer parking and a loading dock that accommodates four big trucks.

"We have added Columbus shock absorbers to our lines," Manager T. H. Coker of Gibbes Machinery Co., Columbia, S. C., reported.





Containing approximately 27,000 square feet of floor space, the new home of Piedmont Auto Exchange at Charlotte, N. C., was opened formally recently to replace the one destroyed by fire some months ago. The entire building is air-cooled and is heated with an automatic oil-fired system. Acoustically-treated ceilings are another feature of this building, whose owner is George V. Gilbert, shown in photo at left welcoming the approximately 600 customers who attended the opening (photo at right above). Gilbert is the new president of the Southeast Automotive Show. The counter is 100 feet long. The big machine shop, shown at left above, is located in the basement. A paved parking lot, 50 by 100 feet, was designed for the trade's use. The company was founded in 1910. Dowd M. Biggers is general manager. Cost of the new building has been estimated at \$130,000.

Oklahoma City and St. Louis Plan for Big "Care" Rallies

Possibly ten thousand men will attend two meetings—one at St. Louis, Mo., and the other at Oklahoma City, Okla.—planned for next month to spotlight attention on the "Care Will Save Your Car" program.

Car" program.

"We hope to have about 5,000 trades people in attendance and look for an excellent meeting over-all," said W. Thomas Mills, Jr., of Auto Parts Co., who is chairman of the executive committee for the meeting set for Tuesday evening, Oct. 9, at Kiel Auditorium in St. Louis.

Said W. H. Vick, vice-president of Oklahoma City Hardware Co., Inc., of the gathering planned for Oct. 22 in Oklahoma City's Municipal Auditorium:

"We hope to have in attendance a large group representing all types of automotive trades—independent garages, service stations, car dealers, implement dealers, etc. Frankly, I can't help but feel that we will have a very successful party and it would not surprise me if we have as many as 4.000 persons in attendance."

as 4,000 persons in attendance."
C. C. "Chuck" Tapscott, vicepresident of McQuay-Norris Mfg.
Co., and a long-time kingpin in
the Automotive Advertisers'
Council (which has promoted the
"Get It from Your Jobber" and

(Continued on page 153)

Carlyle Fraser Shatters Heel

Carlyle Fraser, chairman of the board of Genuine Parts Co., shattered bones in one of his heels last month when he jumped into the new swimming pool at his home at Atlanta, Ga.

The injured limb will have to be in a cast for about ten weeks.

SERVICE AND WARNTENANCE

Why the Filters?

Why the filters?
We have heard this question asked many times, and many times we have thought the answer did not convey sufficient informa-

tion. This prompted us to get into the matter and determine just what filters and filter service mean to the car or truck owner and to the repair shop.

We readily recalled many instances where a better understanding of the purpose of filters, both by our service men and the car owner, would have prevented many complaints about abnormal engine wear.

One instance in particular was that of an operator of a 1½-ton truck equipped with vacuum brakes. At approximately 18,000 miles the owner reported very excessive oil consumption. He also made the usual remark that "I have got a lemon," emphasizing that he knew they all came off the same assembly line, but there had to be a bad one once in a while.

Being of this nature he stayed with the job until the head and pan were pulled. It didn't require any "mikes" to see that the engine was "shot." Cylinder walls and pistons were worn beyond repair, crankshaft and bearings were completely ruined. The "lemon" squawk became louder than ever—"soft block," etc.

At this point we asked him to



Their condition, cleaned or clogged, spells out a lot in terms of engine performance. Do you check them often enough?

join us in the inspection of the vacuum-brake air filter. Right here we had guessed wrong because we thought this unit had not been properly serviced and

Technical Editor

By E. M. Lowery



we wanted to show him. We couldn't, because his driver had removed the filter (which he later admitted), thinking it was not necessary.

The operator finally agreed to pay for a new engine, reluctantly admitting that it wasn't a factory or dealer responsibility. However, he was by no means happy with the transaction.

We have had similar cases of upper cylinder, piston and ring wear caused by lack of proper service of the carburetor air cleaner or filter. Service men sometimes fail to advise the customer of the importance of this unit, and too frequently owners will not authorize the small cost of this service, not realizing that a major engine overhaul may be the result of this negligence.

This brings us to the engine oil filter which, in our opinion, is most important. Why some car and truck manufacturers will leave it off of some of their lower-priced units in order to keep the sales price down is beyond us, especially when they use the oil filter as regular equipment as a sales argument on some of their higher-priced units.

To prove the importance of this item and its acceptability by the owner if properly presented, one of the leading manufacturers conducted an educational and sales campaign recently. Service men were advised of the importance of the filter and its prevention of excessive engine wear. The results of this campaign proved that if properly informed, owners would buy this service; it also showed that where regular filter service was maintained, complaints on engine parts failure were practically eliminated. The repair shops participating in the campaign sold more filters than ever before, thus increasing their parts and labor volume.

Why the Oil Filter?

Whether or not the engine is operated normally or abnormally, the lubricating oil will become contaminated with carbon dust, metal particles and other impurities which are by-products of combustion and normal wear. Oil filters are employed to remove these particles from the oil, thus reducing the wear that would result from such contamination. Most manufacturers employ a

October Issue: Gas Mileage

Do those gas-mileage complaints sometimes have you hopping? Next month Technical Editor Lowery will give some tips on how to handle them successfully.

cartridge-type filter, the filter element consisting of cloth, fine mesh metal, fuller's earth, fiber or fabric screens.

In the cartridge-type filter, oil from the engine enters through the top connection and flows through the filtering 'element, trapping all foreign matter. The filtered oil then circulates through the engine. The filter element continues to trap the foreign matter until it becomes clogged. (This is the danger point.) Then the element must be replaced, as the filter at this point is valueless.

Types of Filter Systems

There are two types of engine oil-filtration systems in general use on current vehicles. The most common of these is the bypass system. The other is the full-flow system. In the bypass system the oil is picked up by the oil pump through the oil strainer, and is delivered under pressure to the oil gallery. To maintain sufficient pressure, an oil pressure relief valve which opens against a spring is provided. A portion of

the oil in the crankcase flows through the filter and returns directly to the gallery.

In this system a restriction hole in the filter outlet controls the amount of oil flowing through the filter. Over a period of time, all of the oil in the crankcase passes through the filter. Since only a portion of the oil in the crankcase flows through the filter, a clogged filter element has no effect on the amount of oil flowing through the working parts of the engine.

Results: A clogged filter element is not indicated other than by examination. The color of the oil will not indicate the condition of the filter element.

The full-flow system is designed to filter all of the oil going to the working parts of the engine. In this type of system, the oil is picked up by the oil pump and delivered under pressure to the filter where all the oil flows through the filter to the main oil gallery, where it is distributed to the working parts of the engine. The main oil-pressure relief valve in this system functions only to maintain the oil pressure at a constant value as engine speed increases, and to return the excess oil to the crankcase.

Another relief valve is provided, functioning as a part of the oil filter, to assure an adequate supply of oil to the engine parts in case the filter element becomes clogged. When the filter becomes so clogged that the oil cannot pass through the element, this valve opens and permits unfiltered oil to flow through the engine.

This outline of operation of the two systems in common use proves that unless proper filter service is practiced, filters become only a gadget—as some service men and owners too often classify them—and engine life is shortened by many thousands of miles.

The inauguration of a filter service and maintenance program in your shop would not only prove a profitable source of revenue but would also eliminate many service complaints from customers.

"We got a shop full of cars as it is, but we'll try to handle yours,"



Diagnosing the POWERGLIDE

PROPER operation of the Powerglide transmission may be affected by a number of factors, all of which must be considered when trouble in the unit is diagnosed.

Proper trouble diagnosis can only be accomplished when performed in a thorough step-by-step procedure. The following procedure has been devised and tested and is recommended for all trouble diagnosis complaints, and if the service man will follow this checking procedure, accurate and dependable diagnosis may be accomplished. This will result in a saving of time, not only to the service man, but to the customer as well.

Selector Linkage

1.—Place selector lever in reverse and check clearance between selector lever and steering wheel rim, which should be 1½" plus or minus 5/16". To adjust, loosen lower support clamp bolts and move up or down as necessary. Tighten clamp bolts evenly.

Note: Make sure dowel in support is located in slot in mast

2.—With selector lever in reverse, check clearance between the reverse stop on control shaft lower support and lower lever (Fig. 1). This clearance should be 3/64".

3.—To adjust, loosen transmission control rod swivel, make sure transmission manual valve is raised to top detent position and selector lever is in "R" (reverse) position. Move selector lever as necessary to obtain 3/64" clearance and retighten swivel.

4.—Check proper installation of short connector rod (bell crank

to parking lock lever); arrow must point up.

Warming Up Transmission

Before attempting to check and/or correct any complaints on the Powerglide transmission, it is absolutely essential that the oil level be checked and corrected if necessary. An oil level which is either too high or too low can be the cause of a number of abnormal conditions from excessive noise to slippage in all ranges.

It must be remembered that cold oil will slow up the action of the hydraulic controls in the transmission. For this reason a trouble or oil leak diagnosis should not be attempted until the transmission has been warmed up by either of the following proce-

dures: Road warm up:

Drive the car approximately five miles with frequent starts and stops.

Shop warm up:

1.—Connect tachometer to engine.

Set parking brake tight and start engine.

Place selector lever in "D" (drive) range.

4.—Set hand throttle (1950 models) or carburetor idle speed adjusting screw (1951 models) to run engine at approximately 750 rpm and operate transmission in this manner for 15 minutes. At the end of 15 minutes of operation, transmission will be sufficiently warmed up for diagnosis purposes.

Note: On 1951 models, readjust the idle speed to 430-450 rpm.

After the transmission has been warmed up, check the fluid level with the engine idling, parking brake set and control level in "N" (neutral). If the fluid level is low, add fluid to bring level up to the full mark on gauge rod.

Caution: If fluid level is too

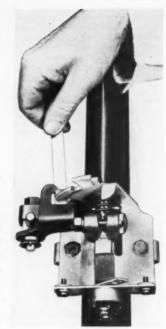


Fig. 1

high, fluid may be aerated by the planet carrier. Aerated fluid will cause turbulence in the converter which will result in lost power, lower stall speed and lower pressures in control circuits. Lower fluid level to full mark, then drive car five miles to work air bubbles out of fluid.

Stall Tests

Check the coolant level in the radiator as a safety precaution, as heat is rapidly built up during the diagnosis operation.

With the tachometer connected to the engine and the service brakes securely locked, open throttle wide, with transmission in drive, in low and in reverse. Note the maximum speed attained in each range and record on diagnosis guide.

Caution: Because of the rapid temperature rise of fluid, the stall condition should never be maintained for more than ten seconds at one time. About two minutes should be allowed between tests to prevent overheating. Stall speed should be almost identical in all ranges and between 1560 and 1610 rpm. If so, there is no slippage. However, other causes

Illustrations and technical data courtesy of Chevrolet Service News.

of faulty operation may exist which can only be revealed by

further checking.

If the engine fails to attain minimum stall speed by several hundred rpm, it is likely the secondary pump is frozen on its hub or the stators are not locking up on the stator hub.

If the stall speed varies much between ranges or exceeds the maximum in all ranges, there is slippage which may be due to insufficient oil pressure or to a mechanical fault of clutch or band.

Pressure Tests

Pressure tests will reveal the cause of slippage as well as several other causes of improper operation.

1.—Support the rear axle on stand jacks so the rear wheels can be driven.

2.—Connect pressure gauges (Fig. 2) to the following test points:

a. Low servo apply.

b. High clutch (release side of low servo).

c. Reverse servo.

d. Rear pump pressure.

Drive range:

1.-Adjust the engine idling

speed to 430-450 rpm.

2.—Place the selector lever in "D" (drive) range, check the idling pressure and record it on the diagnosis guide. Idling pressure should be from 40 to 45 pounds.

3.—Increase speed to approximately 30 miles per hour and note fluid pressure; then load the engine several times by partially applying the brakes while maintaining 30 mph speed. If the vacuum modulator is operating properly, pressure will rise each time. If the vacuum modulator is not operating correctly, check the vacuum lines for leaks. If no vacuum leaks are found, the trouble is in the vacuum modulator:

Note: While making the above tests, check the pressures on the gauges connected to low servo apply and high clutch test points. The readings should be approximately the same with the selector lever in "D" range.

4.—Apply service brakes and accelerate engine to normal stall speed (1560-1610 rpm). Check the pressure reading and record on diagnosis guide. Pressure should be 75 to 100 pounds. If the pressure is within limits but the engine speed exceeds maximum stall speed, high clutch is slipping.

If the pressure is below 75 pounds with the engine at full throttle and the brakes locked, the following items will require checking:

a. Partially plugged oil suction screen.

b. Air leak in oil suction line.
 c. Pressure regulator valve

d. Clutch piston seals leaking.
 e. Clutch drum oil seal rings leaking.

f. Leak at valve body to case gasket.

g. Leak between valve body and housing.

h. Front pump clearances. Low range:

1.—Place the selector lever in "L" (low) range.

2.—With the engine running at idling speed, check the pressure and record on diagnosis guide. The pressure should be from 125 to 150 pounds.

3.-Apply service brakes and

accelerate engine to normal stall speed (1560 to 1610 rpm), check the pressure and record on diagnosis guide. The pressure reading should be from 160 to 200 pounds.

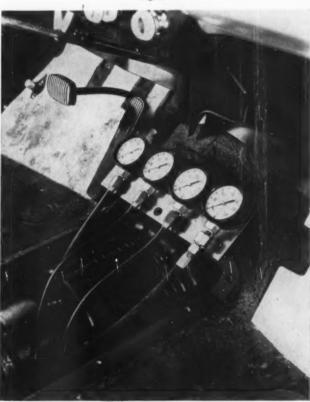
4.—If the pressure is within the above limits but the engine exceeds normal stall speed, adjust the low band by turning the adjusting screw in all the way and backing off three turns.

5.—If the pressure is below the low limit, the trouble may be in the accumulator or hydraulic modulator. Move the pressure gauge attached to the high clutch test to the hydraulic modulator test point.

6.—Repeat the low range idle test. If the pressure is zero or very low on the gauge attached to hydraulic modulator, the trouble is in the accumulator.

7.—If the pressure is the same but below 125 pounds on the gauges attached to the low servo





apply and the hydraulic modulator, the following items will require checking:

a. Partially plugged oil suction

b. Broken or damaged ring in low servo.

c. Pressure regulator valve stuck.

d. Leak at valve body to case

e. Leak between valve body and housing.

f. Leak at servo cover.

g. Front pump clearances.

h. Modulator control lever or piston stuck.

 Leak between modulator and servo cover.

Reverse:

1.—Place the selector lever in "R" (reverse) position.

2.—With the engine running at idling speed, check the pressure on the gauge attached to the reverse servo test point and record the reading on the diagnosis guide. The pressure reading should be 125 to 150 pounds.

3.—Apply service brakes and accelerate engine to stall speed (1560-1610 rpm), check pressure reading and record it on diagnosis guide. At this speed pressure should be from 160 to 200 pounds.

4.—If the pressure is within the above limits but the engine exceeds normal stall speed, the reverse band requires adjustment. It is necessary to remove the

transmission to make this adjustment or correct any damage to the linkage.

5.—If pressure is below the above limits the following items should be checked:

a. Partially plugged oil suction screen.

 Broken or damaged reverse servo piston ring.

c. Pressure regulator valve stuck.

d. Leak at valve body to case gasket.

e. Leak between valve body and housing.

f. Front pump clearances.

g. Modulator control lever or piston stuck.

 h. Leak between modulator and servo cover.

Rear pump:

 1.—Place the selector lever in "D" (drive) range and release the parking brake.

2.—Accelerate the engine until the speedometer registers 30 miles per hour.

3.—Check the pressure at this speed and record it on the diagnosis guide. The pressure at this speed should be 50 to 75 pounds.

4.—Move the selector lever to "L" (low) range and check the pressure, which should be 140 to 189 pounds.

____.5.—If the pressure is less than the above limits, the following items should be checked:

a. Leak at servo cover.

 b. Leak at valve body to case gasket.

c. Leak between valve body and housing.

d.-Rear pump clearances.

Oil Leaks

If a customer complains of high oil consumption or oil leakage, the following points should be checked:

a. Transmission housing side covers.

b. Servo cover and transmission case.

c. Transmission housing and transmission case.

d. Universal ball.

e. Front of flywheel housing.

 Rear axle lubricant level for propeller shaft oil seal.

g. Modulator vacuum line.h. Oil cooler pipe connections.

i. Drain back hole from "U" joint to case not drilled.

If oil leakage shows at front of flywheel housing, remove plug from bottom of transmission housing. Should an accumulation of oil be found in the housing, an oil leak is indicated and the following points should be checked:

a. "O" ring seal between primary pump and primary pump hub.

b. Front pump oil seal.

c. Front pump "O" ring seal.
d. Oil drain in front pump

plugged. e. Converter cover "O" ring

seal.
f. Turbine bolt "O" ring seal.

g. Sand hole in transmission housing allowing leakage between oil sump and converter cavity.

"He knows all the trouble-shooting answers. The thing is, he doesn't know the questions."



Diagnosis of Unusual Conditions

Oil Being Forced Out of Filler Tube

 Oil level too high, aeration and foaming caused by planet carrier running in oil.

Split in suction pipe permitting aeration of oil.

 c. Damaged suction pipe seal permitting aeration of oil.

d. Ears on suction pipe retainer bent, thereby preventing proper compression of the suction pipe seal, permitting aeration of oil.

e. Bore for suction pipe in housing too deep, thereby preventing proper compression of suction pipe seal, permitting aera-

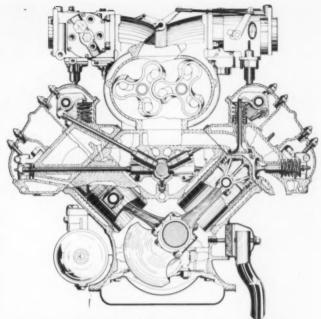
(Continued on page 116)

Buick's XP-300 Engine

A FEW years ago a newspaper reporter new to Detroit saw for the first time a ten-year-old experimental Buick being driven by Harley J. Earl, General Motors vice-president in charge of styling. He thought it was an unannounced model of a new Buick and rushed back to his office to write a story about it.

Unwittingly, this reporter started a series of discussions between Earl and Charles A. Chayne, which eventually led to an experimental program that culminated in two "cars of the future," Le Sabre and the XP-300, Buick's "dream convertible." Chayne, at that time chief engineer at Buick, now is General Motors vice-president in charge of engineering.

Earl undertook the styling of Le



This cutaway drawing of the XP-300 engine shows the valve mechanism and the dome shape of the combustion chamber and pistons. Aircraft-type pressure carburetors—one for premium gasoline and one for methanol—feed fuel into the "Roots"-type supercharger. Intake manifold is designed with a minimum of bends or obstructions to permit easy flow of fuel from the supercharger to the combustion chambers. Valves have hydraulic lifters and exhaust valves are sodium-cooled. Note how upper section of erankease and supercharger nestle deep between the banks of cylinders, keeping the over-all height of the engine to a minimum.

Sabre. Chayne undertook the gine for both cars and also the development of a chassis and en
(Continued on page 140)

The shallow oil pan on the supercharged V-8 engine in Buick's XP-300 can be seen below. Designer Charles A. Chayne was forced to adopt a shallow oil pan to keep down the over-all height of the engine. Note that the oil pan extends from the front of the engine to the rear of the flywheel housing, enclosing the flywheel. A small dry sump is provided around lower part of flywheel to prevent unnecessary churning of oil.

Buick's XP-300 has one of the most powerful and compact engines ever designed for an automobile. Although it is rated at 300 horsepower, it actually has developed 335 horsepower in dynamometer tests. The engine is a supercharged V-8 type and has a piston displacement of slightly more than 215 cubic inches. In comparison, the 152-horsepower engine in a Buick Roadmaster has a piston displacement of 320.2 cubic inches.

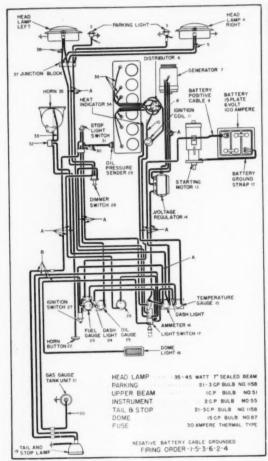


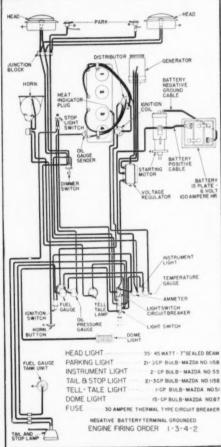


1951 WILLYS STATION WAGON WIRING DIAGRAMS

No. 673

No. 473







It's floodlighting
the whole motoring scene with
the brilliance of its performance

NEW STUDEBAKER COMMANDER V-8

The 120-horsepower wonder car

The most advanced V-8 of popular price in America

CURRENT PASSENGER-CAR SPECIFICATIONS Engine and Equipment

						-	ENC	SINE						
MAKE AND MODEL	Std. Wheelbase	No. Cylinders and Valve Arrangement	Bore and Stroke	Taxable H. P.	Max. Rated H. P. at R. P. M	Camehaft Drive	Main Bearings	No. and Size Comp.	No. and Size Oil	Crankcase (qts.)	Air Cleaner	Oil Filter	Vibra. Damper	Carburetor
BUICK 40 Sp. & 44 Cust. Sp	1211/2	-	3% x 41/8	32.51	120@3600	LB	5	20937	(11875 11865		AC	Y	Y	St-O
BUICK 50 Super (except)	1211/2	8J	31/6 x 41/8	32.51	124@3600	LB	5	20937	(11875	616	AC	Y	Y	St-O
BUICK Model 52	12514	8J	3% x 41/8	32.51	124@3600	LB	5	20937	11865 /11875	61/2	AC	Y	Y	St-O
BUICK 70 Roadmaster (ex-)	1261/4	8J	31/6 x 45/6	37.81	152@3600	LB	5	20937	(11865 (11875		AC	Y	Y	St-O
cept Model 72)	1301/4	8J	3% x 4%	37.81	152@3600	LB	5	20937	11865 11875 11865		AC	Y	Y	St-O
CADILLAC 61 CADILLAC 62 CADILLAC 60 CADILLAC 75	122 126 130 14684	8J 8J	3 ¹³ / ₁₈ x 3 ⁵ / ₈ 3 ¹³ / ₁₈ x 3 ⁵ / ₈ 3 ¹³ / ₁₈ x 3 ⁵ / ₈ 3 ¹³ / ₁₆ x 3 ⁵ / ₈	46.5 46.5 46.5 46.5	160@3800 160@3800 160@3800 160@3800	LB LB LB	5 5 5 5	20781 20781 20781 20781	11875 11875 11875	5 5	AC AC AC	N N N	YYY	Ca-RI Ca-RI Ca-RI
CHEVROLET Styleline and Fleetline Sp. & DeLuxeCHEVROLET Sty. & Fleet. (with Powerglide Drive)	115 115	6J 6J	3½ x 3¾ 3¾ x 3⅓ 3 x 3⅓	29.4 30.4	92@3400 105@3600	G	4 4	21237 (11237 (10932	11863 11863		AC AC	N ¹	Y	RP
CHRYSLER Wind. & DeLuxe CHRYSLER N. Y. & Imperial.	125½ 131½	6I V8	31% x 41/2 31% x 35/8	28.36 46.51	116@3600 180@4000	Ch	5	20937 20781	21562 11875	5 5	Y	Y	Y	B&E Ca
CHRYSLER Crown Imperial	1451/2	V8	313/6 x 35/8	46.51	180@4000	Ch	5	20781	11875		Y	Y	Y	Ca
DeSOTO S-15 DeLx & Custom	80 125½	4J 6I	2½ x 2¼ 3¾ x 4½	28.36	26.5@5400 116@3600	Ch	5	20625	2155 21562	2 5	Fr	Fr	N	T B&I
OODGE Wayfarer	115	6I 6I	31/4 x 45/8 31/4 x 45/8	25.35 25.35	103@3600 103@3600	Ch	4 4	20937 20937	21562 21562	5 5	Y	N	N	St
ORD & Custom 8 Cyl	114	8I 6I	3% x 3% 3.3 x 4.4	32.5 26.1	100@3600 95@3300	G	3 4	20933 20933	2186 2186	5 5	Y	N1 N1	N	Own
PRAZER Std. & Man.	1231/6	- 6I	354 x 434	26.3	115@3650	K	4	20925	21550		AC	Y	Y	Ca
HUDSON Pacemaker	119	61	3% x 3%	30.4	112@4000	Ch	4	2078	21875	7	Y	N	Y	Ca
IUDSON Super 6	124	61	3% x 43%	30.4	123@4000	Ch	4	2078	.156 21875	7	Y	N	Y	Ca
IUDSON Super 8	124	81	3 x 41/2	28.8	128@4200	G	5	2093	.156 21875	7	Y	N	Y	Ca
IUDSON Hornet	124	6I	313/6 x 43/2	34.9	145@3800	Ch	4	2093	.156 21875 .156	7	Y	N	Y	Ca
KAISER Spec. & DeLuxe HENRY J. HENRY J DeLuxe.	118½ 100 100	6I 4I 6I	35/8 x 43/8 31/8 x 43/8 31/8 x 31/2	26.3 15.63 23.44	115@3650 68@4000 80@3800	K G G	4 3 4	20925 20925 20925	21550 1186 1186	5½ 4 5	AC f	Y N ¹ N ¹	YNY	Ca Ca Ca
LINCOLN Cosmopolitan	125 121	V8 V8	3½ x 4¾ 3½ x 4¾	39.2 39.2	154@3600 154@3600	G	3	20933 20933	1186	64.0	Y	Y	Y	Но
	118	V8	3%6 x 4	32.5	112@3600	G	3	20933	2186	D	Y	Y	N	Но
	112 121 100	6I 6J 6I	3½ x 4 3¾ x 4¾ 3½ x 3¾	23.44 27.34 23.44	85@3800 115@3400 82@3800	Ch Ch Ch	4 7 4	20930 20930 20930	21547 21547 21547	5 6 5	AC AC	N N N	Y Y Y	Ca Ca Ca
DLDSMOBILE 88 & 98	j	8J	38/4 x 37/6	45.0	135@3600	K	5	20781	11875	5	AC	N1	N	Ca-RI
	122 127 127	8I 8I 8I	3½ x 3¾ 3½ x 4¼	39.2 39.2 39.2		Ch Ch	5 5 9	20935 20935 20935	11865 11865 11865	7 7 7	AC AC	N	YY	Ca Ca Ca
PLYMOUTH P-22 Concord, Suburban and Savoy PLYMOUTH P-23 Cambridge	111	61	3½ x 4¾ 3¼ x 4¾	25.35	97@3600	Ch	4	20937	21562	5	AC 1	N	N	Ca
and Cranbrook	118½	6I	3½ x 43/8	25.35	97@3600 96@3400	Ch M	4	20937	21562	5*	AC	Y	N	Ca
PONTIAC 8 Model 27	120	8I	3% x 4 3% x 3%	36.4	96@3400 116@3600	M	5	20933	11863	5*	AC	N	Y	Ca
	115 115 119	6I V8 V8	3 x 4 38/8 x 31/4 38/8 x 31/4	21.6 36.4 36.4	85@4000 120@4000 120@4000	G G G	4 5 5	d 2078 2078	11562 11865 11865	5 6 6	AC AC	A A Y	Y Y Y	Ca St St
VILLYS Jeepster & Sta. Wag.	104 104	4F 6I	31/8 x 43/8 31/8 x 31/2	15.6 23.4	72@4000 75@4000	G	3 4	2-3/2" 2-3/2"	1-3/6" 1-3/6"	4 5	HH	N ¹	Y	Ca-Zr Ca-Zr

*-Refill

**-8½ dry, 6 refill

A-Accessory

AC-A.C. Spark Plug

B&B-Carter

Ca-Carter

Ch—Chain
D—6 dry, 5 refill
d—Top .0937, Middle .125
F—F Head motor
f—A.C., United Speciaties and Industrial Wire Cloth Products

ABBREVIATIONS Fr-Fram G-Gear HH-Houdaille-Hershey Ho-Holley I-L Head motor j-"88", 119½; "98", 122

J-Overhead valve
K-Link Belt or Morse
LB-Link Belt
M-Morse
NI-Optional at extra cost
N-No

RP—Rochester Products St—Strombers T—Tillotson Y—Yes Zn—Zenith

UNITED MOTORS MARKET MEASURED BY MILLIONS OF OWNER-PROVED UNITS

NAMES KNOWN EVERYWHERE

DELCO Batteries **AC Gauges, Speedometers** and Rebuilt Fuel Pumps SAGINAW Jacks **MORAINE Engine Bearings DELCO** Radio Parts ROCHESTER Cigar Lighters **HYATT Roller Bearings INLITE Brake Lining** HARRISON Heaters **GUIDE Lamps** DELCO Clocks NEW DEPARTURE **Ball Bearings** DELCO Shock Absorbers **MORAINE** Gasoline Filters HARRISON Thermostats DELCO-REMY Starting, Lighting and Ignition KLAXON Horns HARRISON Radiators **ROCHESTER Carburetors DELCO Hydraulic Brakes**

ORIGINAL EQUIPMENT ON OVER 50% OF TODAY'S VEHICLES

Yes, more than half the cars, trucks and buses on the road today use United Motors lines as original equipment. And that means an enormous pre-sold market for you.

YEAR-ROUND SALES

United Motors lines-leaders in their field-assure United Motors dealers of an almost unlimited market . . . of yearround sales, and a strong and always-growing business.

TOP-FLIGHT DISTRIBUTORS

You'll enjoy doing business with United Motors distributors. The United Motors distributor and his staff are men of importance in your area. They have had wide and valuable experience in the automotive business. Call your United Motors distributor soon . . . find out what he can do for you. You'll find his friendly counsel invaluable.

UNITED MOTORS SERVICE

Division of General Motors Corporation . General Motors Building, Detroit 2, Michigan



CURRENT PASSENGER-CAR SPECIFICATIONS

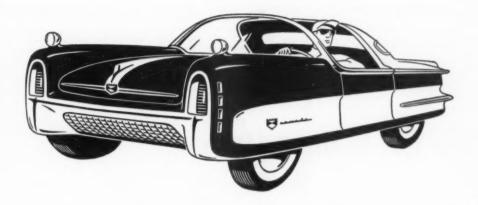
Timing, Battery, Brakes, Etc.

			IG	NITIO	N AND	TIMIN	G		Battery	7 2	Clt	itch	Faci		Br	aker
MAKE AND MODEL	Breaker Gap (.0)	Spark Plug Gap (.0)	Tappet Clear- ance Intake	Tappet Clear- ance Exhaust	Intake Valve Opens b or a TDC	Cam Angle (degrees)	Breaker Point Arm Tension (028.)	Cyl. Head Bolt Tension (ft. lbs.)	Cap. and Ter. Gd.	Cool. System (Qts.) No heater	Make	Thickness	Outside Di-	Inside Diameter	Type	Parking Brake
BUICK 40 Sp. & 44 Cust. Sp.	15	25	15h	15h	13°b	X	19-23	65-70W	100N	13.5		.125	10	6	H	RV
BUICK 60 Super	15	25	d	d	13°b	x	19-23	65-70W	100N	13.5	Bb L Bb	.126	10	6	н	RV
BUICK 70 Roadmaster	15	25	d	d	14°b	X	19-23	65-70W	120N	18		ne	use	d	H	RV
CADILLAC 60, 61 & 62 CADILLAC 75	13-18 13-18		au	au	24°b 24°b	31 31	19-23 19-23	65-70 65-70	115N 115N	18 18	L ³	.137	10½ 11	7	H	RV
CHEVROLET Styleline and Fleetline Sp. & DeLuxe. CHEVROLET Sty. & Fleet.	18	35 35	06h	13h	1°a 16°b	34	17-21	70-80W	100N 100N	15	0		91/8		H	RV
(with Powerglide Drive) CHRYSLER Wind. & DeLuxe CHRYSLER N. Y. & Imperial	20 18	35 35	08h 08h	10h 10h	12°b 15°b	341-38 271-304		EW EW	120P 135P	15 25	Bb		9141 914	63	H	Ps Ps
CHRYSLER Crown Imperial	18	35	08h	10h	15°b	274-304	17-20	EW	135P	25	Bb	.125	101/4	61/3	H	Ps
CROSLEY Model CD	20	25	06	00	5°b	46	17-20	No	90P	4	0	. 125			H	RV
DeSOTO S-15 DeLx. & Custom	20	35	08h	10h	12°b	341-38		EW	120P	15		. 125	-	63	H	Ps
FORD & Custom 8 Cyl FORD & Custom 6 Cyl	20 14-16 24-26		08h 13-15 13-15		5°b 11°b	341-38 26-281 35-38	17-20	65-70 65-70	90P 100P	22 17.3	L L	.125	91/2	6	SS	RV RV
FRAZER Std. & Man.	20	32	14	14	10°b	38	17-20	30-35c	100P	13	T	.125	-	6	H	RW
HUDSON Pacemaker. HUDSON Super 6 & Hornet. HUDSON Super 8.	20 20 17	32 32 32	08 08 -08	10 10 10	7½°b 7½°b 10¾°b	38 38 27	17-20 17-20 17-20	70-75W 70-75W 45-50W	100P 100P 120P	1834f 1834f 1834f	0	.203	913/6 913/6 913/6	63/8 63/8 63/8	DDD	RW
KAISER Spec. & DeLuxe HENRY J. HENRY J. DeLuxe	20 20 20	32 30 30	14 16 16	14 16 16	10°b 9°b 5°b	31-37 41±1 38±1	17-20	30-35c 60-65 60-65	100P 100P 100P	13½ 10.8 9	Bb Bb Bb	.125	91/4 81/2	6 5 ³ / ₈ 5 ³ / ₈	HHH	RW
LINCOLN Cosmopolitan	14-16 14-16		0	0	5°b 5°b	26-28 26-28	17-20 17-20	65-70 65-70	120P 120P	34½ 34½	L	.125	10½ 10½	7 7	SS	RW
MERCURY	14-16	29-32	13-15	17-19	5°b	26-28	17-20	65-70	100P	221/4	Bb	.125	10	61/2	S	RW
VASH Statesman VASH Ambassador VASH Rambler	18-24 18-24 18-24		15 15 (15h (16c	15 18 15h 18c }	6°b 8½°b 6°b	35 35 35	17-21 17-21 17-21	60W 70W 60-65W	90P 105P 90P	14 17 11		. 125 . 125 . 125	10	53/8 7 53/8	HSH	RW RW
DLDSMOBILE 88 & 98	16	30			13½°b	26-33	19-23	60-70W	115N	211/2	L	. 136	10.5	7	H	RW
PACKARD "200" PACKARD "300" PACKARD "400"	12½- 17½	26-30 26-30 26-30	07 au au	10 au au	15°b 15°b 15°b	Z Z Z	0	60-62 60-62 60-62	100P 100P 120P	19.9 19.9 19.9	L L au	. 125 . 125 au	101/2	63/4 7 au	HHH	RW RW
LYMOUTH P-22 Concord, Suburban and Savoy LYMOUTH P-23 Cambridge	20	35	10h	10h	12°b	341-38		EW	100P	13	Bb	.125	91/8	61/8	н	Ps
and Cranbrook	20	35	10h	10h	12°b 5°b	341-38	17-20	EW 60W	100P 100N	18	Im	.125	91/4	6	H	Ps
PONTIAC 8 Model 27	16	23-28 23-28	12h	12h 12h	5°b	31-37 21-30	19-23	60W	100N	18½ 19½	Im	.125	10	68/4	H	RW
TUDEBAKER Champ. 10G TUDEBAKER Comdr. H TUDEBAKER Land C. H	20 13–18 13–18	22-27 33-37 33-37	16c 14-16 14-16	16c 14-16 14-16	15°b 11°b 11°b	38 22-29 22-29	17-20 17-20 17-20	46-50W 46-50W 46-50W	100P 100P 100P	10 17¼ 17¼	Bb Bb Bb	.125 .125 .125	8 91/4 91/4	53/8 6 6	H*	RW RW
VILLYS Jeepster & Sta. Wag. VILLYS Jeepster & Sta. Wag.	20 20	30 30	18 14	16	9°b 5°b	51 38½	17-21 17-21	60-65 60-65	100N 100N	11 9	Bb Bb	. 135 . 135	81/2	51/8 51/8	H	RW

1—16" on DeLx. or Windsor with std. 3-speed tering sarews 65 to 70 tering screws 65 to 70 serews 65 to 70 sere

P.—Positive
Ps—Propeller shaft, rear
V=nanmission.
RW—Rear service brake
S—Duo Serve
T—Borg & Beck, and
U—AupLite 19-23,
Deloo 17-21
Deloo 17-21
Deloo 21

W—Warm
X—Do not recommend using dwell meter for setting breaker point grape of one degree, allowed in adjusting 2—Auto-Lite 27. Deloo 31



New <u>VEEDOL</u> goes far beyond "Premium-Type" oil performance ...to safeguard Modern Motors!



For cars and trucks—VEEDOL, "The World's Most Famous Motor Oil" goes far beyond mere "premium-type" oil performance to keep motors cleaner . . . smoother-running. Veedol contains an ingredient that cuts down gummy carbon deposits . . . keeps rings free . . . compression high . . . reduces corrosive acids that attack bearing and other vital engine parts.

For tractors—150-HOUR VEEDOL TRACTOR OIL gives a full 150 hours service in gasoline fueled tractors and cuts oil consumption in all tractors regardless of fuel used.

Dealers and distributors who sell 100% Bradford, Pennsylvania Veedol will tell you it's a product that wins steady customers and is highly profitable to handle. Veedol is sold through independent distributors. Write for information today!

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VEEDOL TRACTOR OIL

100% PENNSYLVANIA AT ITS FINEST



Regulations and News Items Along Federal ROW

CAR PRODUCTION

The Passenger Car Manufacturers Industry Advisory Committee last month denied that automobile sales are below production levels set by current use of raw materials in the industry.

Meeting with NPA officials, the

manufacturers reported that dealers' inventories of new cars are decreasing. They volunteered to submit sales and stock records to substantiate this claim. They said the automobile industry should not be "isolated" in this situation, however, and urged that manufacturers of other consumer durable goods make similar reports.

Fourth-quarter CMP allotments to the industry are expected to permit production of about 1,100,-000 cars-60 per cent of first-half 1950 base period production. The industry's permitted third-quarter production, when manufacturers operated outside CMP, was 1,200,-000 cars

An industry spokesman recommended that the manufacturers be permitted to procure premiumpriced conversion steel without CMP allotments while placing allotment orders with regular mills. He said one order would be cancelled upon acceptance of the other and that the CMP allotment limitation would be observed. Unless the industry has this "insurance," he said, fourth-quarter production will not meet schedules.

NPA pointed out that placement of duplicate orders is a violation of CMP regulations. Manufacturers can place orders for conversion steel, which is more available than mill steel at a higher price, with CMP allotments, officials said, but the procurement may not exceed the CMP allotment. They said the matter of conversion steel will be considered. however.

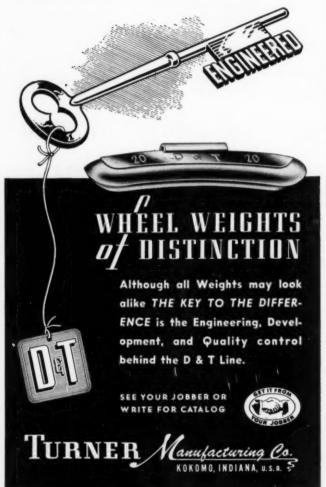
SETTING CARCASS PRICES

New ceiling prices on passenger-car tire carcasses, \$3.50 retail and \$2.60 wholesale, became effective last month. Sellers of recapped and retreaded tires will determine their ceilings by adding to the ceiling price of the carcasses their individual ceiling prices for the services of recapping or retreading.

PRODUCING MORE TOOLS

Automobile manufacturers have advised the National Production Authority that they are able and willing to help relieve the present critical shortage of machine tools by building tools or component parts in their tool shops. Production of metal-working tools would be limited to those turned out by





Coinsurance Reduces Insurance Expense!

PREMIUMS ARE LOWER YET PROTECTION IS ADEQUATE



A wise old man called his quarrelsome sons about him. Taking up a bundle of sticks, he commanded each in turn to break the sticks. All tried, but in vain, and said it could not be done.

(From advertisement of The Youngstown Sheet and Tube Company)



Gentlemen:

For several years we have handled our insurance with Federated Mutual. Our relationship with your company has always been very satisfactory and has saved us many dollars in insurance premiums over the years.

We do not hesitate to recommend you to other dealers for their insurance needs.

Sincerely yours, SOUTHERN HARDWARE COMPANY Signed Frank Ledbetter, Owner

"And yet, my boys, nothing is easier to do," said the father, as he undid the bundle and broke the sticks, one by one. "By this example, you can see that united you will be more than a match for your

enemies; but if you quarrel and separate, your weakness will put you at the mercy of those who attack you."

The truth of this fable is just as timely today as it was when the Greekex-slave Aesop told it 2,500 years ago.

In, perhaps, its most useful down to earth practical application for dealers it points to the wisdom of belonging to ones trade association. Not only belonging but availing oneself of its services on the one hand, and helping to keep it strong on the other. Present day conditions offer more than one threat to the dealer's future. Never has there been more to be gained through strong trade associations, or more to be lost through lack of united action.

A good bargain with benefits for both you and your insurance company is Coinsurance. For you it makes possible the kind of protection you should have at a saving. For the company by assuring proper relation between insurance and value it spreads the risk and gives a better break on small losses.

Here's how it works. You agree to carry insurance up to an agreed percentage of the value of your property—say 80%—enough to cover your loss in event of a serious fire or other catastrophe. If you fail to keep your insurance up to the agreed percentage of value you will have to assume a share of any loss. Let's say value of property is \$100,000 and you start out with \$80,000 in insurance. The value increases to \$120,000. You should increase your insurance to 80% of \$120,000 or \$96,000, but let's say you don't and a partial loss occurs. You carried \$80,000 in insurance when you should have had \$96,000. The company will pay \$80/96 or 5/8 of the loss. (The company will pay face amount of policy if loss is total). Had you increased insurance to \$96,000, the company would pay the full amount of the partial loss.

Coinsurance is definitely a good buy. For more information see the nearest Federated Mutual Man. For his name consult your classified telephone directory or write us.

"ARE YOU FULLY COVERED?"



Believe in Signs? Signs won't keep them out, but for a few cents a day, Insurance gives you a lot of Peace of Mind whether you ever suffer a loss or not. The cost is LOW—the satisfaction HIGH—why pass it by? Call the Friendly Federated Mutual man today. For his name consult your classified telephone directory or write us.





IMPLEMENT and HARDWARE INSURANCE COMPANY * OWATONNA, MINNESOTA

their tool shops, the manufacturers explained, because equipment used for mass production of automobiles and trucks cannot be adapted to the making of machine tools.

ANTI-FREEZE PRICES

Dollars-and-cents price ceilings on three standard types of antifreeze (type S volatile, such as synthetic methanol, type SC, diluted synthetic methanol, and type P, permanent glycol) have been set up in a new regulation, CPR 57, by OPS. Ceilings are applicable at both wholesale and retail levels.

The spelled-out prices are at the same level at which major brands were frozen on January 26, 1951. They are 25 cents a gallon higher at retail than they were at the outset of the last season. For all types of anti-freeze not covered in the order, sellers will determine their ceilings by applying to the spelled-out ceilings the

same percentage discounts or price differentials that were in effect from April 1 to December 1, 1950. Retailers must post ceiling prices in their establishments, it was pointed out.

TRUCK PRODUCTION

NPA announced to the Motor Truck Manufacturers Advisory Committee last month that fourth-quarter production of trucks will be cut back about seven per cent over the third-quarter rate, with fourth-quarter allotments authorizing production of 256,000 trucks: 139,637 light, 83,780 medium and 32.583 heavy.

NPA said the fourth-quarter CMP allotments to truck manufacturers were to be mailed August 15. Advance allotments for the first, second and third quarters of 1952 will be included. These advances will amount to about 75 per cent of the allotment for the first quarter 1952, 60 per cent for the second quarter and 50 per cent for the third quarter of next year.

PROTECTS TRADE MARGINS

In the Defense Production Act as it was revised by Congress and approved on July 31, there is one new section which specifically protects the customary trade margins of retailers and wholesalers. This is Section 104 (k), as follows:

"(k) No rule, regulation, order or amendment thereto shall hereafter be issued under this title. which shall deny to sellers of materials at retail or wholesale their customary percentage margins over costs of the materials during the period May 24, 1950, to June 24, 1950, or on such other nearest representative date determined under section 402 (c), as shown by their records during such period, except as to any one specific item of a line of material sold by such sellers which is in short supply as evidenced by specific government action to encourage production of the item in question. No such exception shall reduce such customary margins of sellers at retail or wholesale beyond the amount found by the president, in writing, to be generally equitable and proportionate in relation to the general reductions in the customary margins of



TUTHILL

has specialized in the manufacture of top quality

SPRINGS

There's more than steel and 70 years of EXPERIENCE in Tuthill Springs.

There's more than QUALITY... the finest alloy steel obtainable, heat treated for greater strength and longer life. There's also PROFIT in fast turnover for a product that is constantly in demand because it's dependable and priced right. And now there's even more... MOLYBDENUM DISULPHIDE (MoSz), the newest Tuthill extra that keeps springs from squeaking and galling.

What's more, Tuthill Springs are "Moly Disul" treated at no extra cost!



Service valves in all with

Ford-built motors

The correct combinations for servicing valves in any motors built by Ford since 1928. Step-by-step procedures for every type described in latest edition of famous K-D Valve Service Manual. Write for free copy, or ask your jobber.

MODELS	TO REMOVE	TO REPLACE
V-8 1932 -'33	245 Bar Lifter 818 Guide Driver	245 Bar Lifter
All other V-8 - (except 60 h.p. and 150 h.p.)	920 Valve Guide Puller Set Genesists of 917 Driver and 918 Puller	OR 245 Lifter Replacer
1949-51 V-8 Optional servicing individual valves without removing guides	930 Valve Spring Compressor	930 608 Compressor Valve Keeper Inserter
V-8, 60 h.p.	860 Valve Guide Puller Set	260 Bar Lifter
V-8,150 h.p. Truck and Lincoln 1949-51	930 Compressor to raise spring	930 and 935 Compressors 608 Inserter for free type volves
Lincoln-Zephyr and 4 cyl. (late): Tractor to 1949	920 Valve Guide Puller Set	925 Replacing Tool (These engines have no "heel" to rest a bar lifter)
6 cyl. to 1948	920 4 923 Set 4 Adaptor	a partificer)
6 cyl. after 1948 (except 110 h.p.)	700	700 + 608 Keeper Inserter
Tractor after 1949	Valve Spring Lifter	700
6 cyl. Truck 110 h.p. 1950-51	Linds	608 Inserter for free-type valves
4 cyl. Models A, B	307 Lifter 502 Guide Driver	307 Lifter
K-D TOOLS MA	AKE HARD JOBS EAS	Y K-D MFG. CO., LANCASTER, PA.

all other classes of persons concerned in the production and distribution of the excepted item of material.

"Prior to making any finding that a specific item of material shall be so excepted, or as to the amount of the reductions in customary margins to be imposed upon retail and wholesale sellers of such item, the president shall consult with representatives of the affected retail and wholesale sellers concerning the basis for and the amount of the exception

which is proposed with respect to any such item."

CAROLINIANS PROSECUTED

First prosecutions in the Office of Price Stabilization nation-wide drive on used-car dealers violating OPS filing regulations were recorded in the Federal District Court in Raleigh, N. C., August 2 when Judge Don Gilliam signed temporary restraining or der sagainst 16 eastern Carolina used-

car dealers.

This action, culminating three months of effort on the part of OPS enforcement agents in Raleigh to secure voluntary compliance, was the most vigorous action taken in any OPS enforcement district up to that date, Edward P. Morgan, assistant OPS director in charge of enforcement, stated.

According to James F. Latham, Raleigh OPS district enforcement director, the 16 firms are restrained from selling or delivering used cars until such time as they come into compliance with OPS regulations.

Used-car dealers throughout the country have been given ample time to comply with OPS regulations, according to Morgan, who said that OPS would seek injunctions in further violations. The Carolina dealers were charged specifically with failing to file statements with OPS giving required information as to which of several accepted guide books they are using in establishing their ceiling prices.

Planned prosecution of delinquent dealers throughout the country has raised compliance with OPS regulations from a low of 30 per cent to a high of approximately 90 per cent, Director Mor-

gan said.

Truck-Equipment Manual Distributed by Dodge

A comprehensive manual on special equipment suitable for mounting on its various truck models has been prepared by the Dodge Division for its dealers. Names of suppliers are listed by states and many catalog pages on their products are included.

The book is tab-indexed for quick reference. In addition to listings of cab and body applications, there are special sections on accessories, chassis equipment and other items.

"We believe it is an excellent medium for selecting the proper type of special equipment for the complete truck," said L. F. Van-

Nortwick, director of truck sales for the division.

Buicks Go to Eisenhower

Buick Motor Division has shipped 24 cars to Europe this year for Gen. Dwight D. Eisenhower's staff, Albert H. Belfie, general sales manager, said last month.



The biggest news in storage battery history

EXIDE ANNOUNCES THE SENSATIONAL



A revolutionary development in

DESIGN • CONSTRUCTION • PERFORMANCE • SERVICE LIFE



HERE IT IS

Out of the Research Laboratories of Exide, creator of the first automobile starting battery, comes an amazing new battery—
the Exide ULTRA START.

So startling are the results of continuing tests, that we hesitate to predict just how long this remarkable new battery will last. Barring accident or downright neglect, the owner of an ULTRA START will not have to buy another battery for a long, long time.

Here's Why-EMI outlasts other aux

NEVER BEFORE SO MUCH SELLING AMMUNITION AS

TRIPLE CONTRIBUTION TO LONGER BATTER

SILVIUM — THE CORROSION-RESISTANT GRID ALLOY



For years battery manufacturers sought the alloy that would defeat a battery's most destructive enemy—grid corrosion, caused by overcharging, which accounts for 60% of all battery failures. Corroding tests of grids, made with newly-developed alloy of silver, lead and other components, show a life span more than double that of ordinary grids.

Here's just one of the SILVIUM tests: An experimental battery was built, using two cells with SILVIUM grids, and one standard cell. After three years of hard use on the road, the battery was torn down for examination. The standard cell was worn out; the SILVIUM cells were still good. The battery was then rebuilt, using the same two old SILVIUM cells and a new standard cell. At the end of three more years of hard use, the second standard cell was worn out, but the cells with SILVIUM were still good for many, many more months.

2 ACTIVE MATERIAL - NEW FORMULA



The power capacity of a battery depends largely upon the active material in the plates. The ACTIVE MATERIAL in the ULTRA START is an entirely new formula, developed through exhaustive electro-chemical research.

So effective is the new active it is possible to take full ac solution of lower specific gra

1 PORMAX -PRACTIC



Following these SAE tests, the built into another battery, we have good service for 23 they were found to be still incombined tests are equivalent service in an automobile! POF internal resistance increases

OF ULTRA START utomobile batteries

AS THESE LONG-LIFE ULTRA START FEATURES

TERY LIFE

ctive material of the ULTRA START that full advantage of the benefits of an acid ic gravity (1.260 full charge).

ACTICALLY INDESTRUCTIBLE SEPARATORS

PORMAX is a plastic separator... extremely resistant to heat and acid, flexible and tough. Laboratory and road tests prove that it has many times the life of ordinary separators. Here's one of many PORMAX tests:

One complete set of 42 PORMAX separators was used consecutively in three 15-plate batteries and subjected to the standard SAE life-cycle tests. The separators were in excellent condition after a combined total of 1500 life cycles.

sts, the same PORMAX separators were ry, which was installed in an automobile. or 23 months. Removed from this battery, still in excellent condition. Results of the ivalent to approximately eight years of PORMAX is extremely porous. Its low ases cold-weather starting ability.

PLUS THESE OUTSTANDING FEATURES

VITREX RETAINERS (a glass-plastic composition). Used with PORMAX separators. Not affected by chemical or electrical reactions.

ELEMENT PROTECTOR, a perforated guard which rests on top of each element, protecting it from physical damage. Thus when you make a hydrometer test or add water there is no danger of harming plates or separators.

PLASTIC CONNECTOR SHIELDS over cell connectors eliminate danger of shorting the battery by tools or other metal objects laid on top of battery. "Test slots" in shields make it easy for you to check cell voltages.

PLASTIC VENT CAPS have a new type of double baffle which prevents loss of electrolyte through "spitting." Milled edges make cap removal easy, saving your time when servicing or testing.

IMPROVED SEALING COMPOUND seals battery elements firmly in place in the container. Has remarkable adhesive qualities. Eliminates "acid creep." Stays tight in high or low temperatures.

SHOCK RESISTANT CONTAINER. Ruggedly built and strongly reinforced to avoid damage in handling or in the car. Made of a special rubber compound that provides not only great mechanical strength but also high resistance to acid penetration.

YES... Exide has EVERYTHING

Two-color, double-page advertisements in big-circulation national magazines announce the Exide ULTRA START to car owners in your neighborhood.

THE SATURDAY EVENING POST	12,946,000
LIFE	21,852,000
COLLIER'S	8,696,000
TIME	3,277,000
COUNTRY GENTLEMAN	6,780,000
FARM JOURNAL	7,886,000
Total Readers	61,437,000

Your customers will want the ULTRA START—the sensational new Exide. Be ready to supply them.

Order ULTRA START batteries from your Exide Distributor today.

WHEN IT'S AN Exide YOU START

THE ELECTRIC STORAGE BATTERY COMPANY
Philadelphia 2

"EXIDE" "PORMAX" and "VITREX" Reg. Trade-marks U.S. Pat. Off. "ULTRA START"—T.M. Reg. applied for.

Printed in U.S.A.



"The Salvation of My Business" 11\$2,000 worth of Extra Work"

Business is BOOMING for Koppers Certified Business is Buuminu for Koppers Certified
Engine Experts! Thousands of repair shops are boosting business with Koppers red-hot SALES boosting business with Koppers rea-not SALES BOOSTER PROGRAM and BUDGET REPAIR PLAN. Ask your Koppers American Hammered jobber how YOU can cash in on the big program. DO

IT TODAY! Koppers Company, INC., Piston Ring Dept., Baltimore 3, Maryland.

Work Financed No Down Payment

In Canada: Colonial Traders, Ltd., Toronto

WANTS NEGATIVES

Nashville, Tenn.

Gentlemen:

I am in need of the negatives of the pictures that appeared in the article in Southern Automo-TIVE JOURNAL about our automobile business. We want to use the same pictures in some advertising we are planning for our display at the 1951 state fair. The article appeared in the January issue.

A. E. MOORE,

Moore's Super Servicenter We are sorry we don't have the negatives but we are passing your request on to our editorial representative who prepared the artiA column of informal comments about the automotive trade and its problems.

"OUR LATEST PICTURE"

A lot of vacation "wish you were here" cards were in mails last month. A simple card of that sort was sent out in August by L. S. Jullien, Inc., on which had been printed in handwritten

"Have you seen our place lately? Here's the latest picture of it.

L. S. Jullien.'

On the reverse side, in colors, was an exterior view of the handsome building of this Washington, D. C., wholesaler.

SCRAP BUYERS' NAMES

Plain Dealing, La.

Dear Sir:

Will you please send me the names of companies that buy scrap metal, including iron and copper, and old batteries, old tires, etc. I would like to ship direct to the company.

Sincerely.

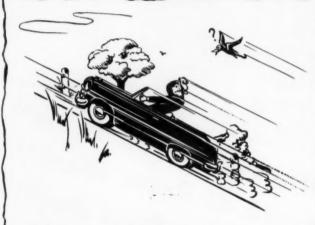
W. W. HUDDLESTON. Huddleston & Son Wrecking

Glad to be able to send you the addresses of these firms situated nearest to you. Scrap-drive chairmen are telling us that it's true today what was true in World War II: If we're going to win the scrap, we've got to get in the scrap!

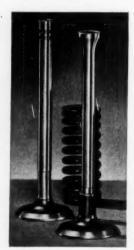
WHAT'RE YOU DOING?

What are you doing that you're proud of? Are you achieving some goals in the selling or servicing field you can boast about? Let the editors in on your success.

Please address any comments to: Shop Talk, Southern Auto-motive Journal, 806 Peachtree St., N. E., Atlanta 5, Ga.



help restore that "FIRST YEAR" pep...



MANLEY

VALVE SPRINGS

Manley Valve Corporation Philadelphia 30, Pa.

District Sales Representatives: Lawrence M. Hirsig Co. Jacksonville J. S. Connell Co., Dallas





Don't miss this one, Mac!

Body jobs like this are just too good to miss—but for figures that are really stacked, "Mac" should look at the annual sales potential for Monroe Replacement Shock Absorbers! That adds up to more than \$65 million, and is growing bigger all the time—what with every make of car but one now using direct-acting shocks and with Monroe standard equipment on more makes than any other kind.

The public knows and accepts Monroe as the leading brand of shock absorber. That makes Monroe easier to sell . . . easier to tie in with the flood of advertising and publicity that is making America "shock absorber conscious". Ask your jobber, or write us for details of the profitable Monroe franchise.

MONRO-MATIG

SHOCK ABSORBERS

Your best bet for more replacement profits!

Everyone is talking about MONRO-MATICS—the amazing new shocks that adjust themselves to all roads and loads. Everyone wants to replace with MONRO-MATICS—and that makes your profit opportunities better than ever. Don't miss this chance to cash in on the growing popularity of MONRO-MATICS. Order your stock today.



Monroe, Mich. - World's Largest Maker of Ride Control Products

Electric...and now

for automotive

S ELECTRIC sizes

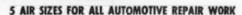
3 ELECTRIC sizes up to 1¼" capacity

Ingersoll-Rand Impactools easily give 25% more flat rate hours per day. This means that a shop owner by investing only in Impactools can profit by . . . increased customerlabor sales . . . increased parts sales . . . faster service . . . and higher shop morale. It also means increased earnings for flat rate mechanics.

Use only One Multi-purpose 9-R Impactool for NUT RUNNING... DRILLING... REANING...

(the only complete line) CTO

nut running jobs



These powerful, light-weight AIR tools offer the same outstanding performance advantages found in Ingersoll-Rand electric Impactools . . . the standard in the automotive service industry.

5 AIR sizes up to 11/2" capacity

Ingersoll-Rand ORIGINATOR OF IMPACTOOLS—air and electric

TAPPING...SCREW DRIVING...HOLE SAWING...STUD DRIVING... EXTRACTING BROKEN STUDS...WIRE BRUSHING...WOOD BORING...MASONRY DRILLING

SOUTHERN AUTOMOTIVE JOURNAL for SEPTEMBER, 1951

111

Dear Bill.

I'm inclined to agree with you about a lot of the brake jobs turned out in shops in these days and times. If the driver were immediately confronted with an emergency stop, at any speed at all, after leaving with his new reline, he'd never make the

It seems that there has been a trend towards emphasis on the initial contact with the customer when he comes in the drive and the sharp decline on the por-





Recommended by Men Who Know

The men who know the importance of quality replacement parts use and recommend G-H Front End Suspension Parts, Tie Rod Ends and King Bolt Sets, Each G-H replacement part is scientifi-

cally engineered, precision built of the finest materials to give guaranteed performance. Increased sales, better profits, more satisfied customers are yours with the complete G-H "Safety Parts" line. Ask the G-H man or write us.



HERSHEY METAL PRODUCTS, INC. Derby, Connecticut



tion of the deal that follows, namely, the repair job and the road test. Our work has become such a race with time we sometimes forget that our reason for being here is to give the motorist a good, honest job. We get so involved in beating flat rate and getting ready for the next job, we lose interest in the job at hand and sometimes let go of it too

quickly.

That job on your car you mentioned is typical. The guy got new linings on your car so fast you couldn't wait to get home and pull a wheel to see if he'd actually put them in. When you found that he had indeed put on new linings you began to wonder if in all that furious speed he'd have had time to give the drums and hydraulic system a fair inspection. You wonder if he hadn't just hoped grooves in the drum weren't too deep, that no pistons were sticking or leaking and that you'd get lining-to-drum contact worn in by normal usage before you had to make an emergency

I'm pleased to report that our brake jobs still get a drum turning when the drum surface indicates the need for it. We contour-grind the linings, inspect the hydraulic units and make a road test. How can we do anything less? Aside from this being good shop practice, you make more money for a drum-turning job. We charge for any repairs found necessary in the hydraulic system, or during a road test, and we certainly aren't going to find ourselves facing charges in court because one of our brake jobs didn't stop a car in reasonable limits, if the owner has an accident on the way home from the

There's no economy that I can see in rushing through a job so fast you can't sell everything

"I've stopped playing GUESSING GAMES!"

It means too much to me in dollars and cents to take any chances on having one of my customers dissatisfied with the paint job he gets in my shop. I don't guess or gamble on results. I play it safe by always using Martin-Senour thinners and reducers. They're FACTORY-PACKAGED and FACTORY-SEALED so I know what I'm getting and I know how it will perform.

MARTIN-SENOUR THINNERS AND REDUCERS GIVE YOU TOP PERFORMANCE, TWO-WAY PROTECTION

M-S Lacquer Thinners

6286—PREMIUM THINNER for top quality results. Recommended for hot, humid weather and when the smoothest possible finish is desired.

6295—"GENERAL USE" THINNER—medium drying. Recommended for all 'round shop use with lacquer colors and undercoats.

6298—FAST DRYING THINNER—economical price. Often preferred for undercoats.

M-5 Synthol Reducers

8001 — FAST DRY — Recommended for cold weather use and where conditions require fast drying.

8002—FLEET REDUCER—Slow drying. Recommended for fleet and commercial work or use in extremely hot and humid weather.

8004—SYMETRO-FLOW—Amazing flow without retarding dust free or drying time.



JOHN OWEL, HEAD PAINTER AT COSTELLO FORD SALES, INC. KALAMAZOO, MICHIGAN, SAYS:

"The thinners and reducers you usecan make the difference between a good job and a bad one. We want only good jobs to go out of our shop so we

don't take any chances. We use Martin-Senour factorypackaged and factory-sealed thinners and reducers." Be sure! Specify Martin-Senour!

Your N.A.P.A. Jobber has Martin-Senour Thinners and Reducers

MARTIN-SENOUR

2520 South Quarry Street, Chicago 8, Illinois



Factory Packaging ... the only Positive Control from Factory to Finisher

needed, particularly when you can charge for them all, and when you have your neck out if you fail to sell a profitable operation.

We're getting lined up to take care of our fall special again. If our recent experience means anything, we'll have to look a little closer than usual for coolingsystem leaks. Been catching quite a few in the late models, and won't want to lose the anti-freeze before the cold weather arrrives.

Most of the cars we got had

low-reading thermostats in 'em so they could use the volatile antifreeze. Probably will sell a number of the higher-reading units so the customers won't kick too much about low heater output this winter.

All cooling-system units will require special attention to keep them in the running, I figure. The materials they are made from are hard to come by these days

> Yours, Ed.

Correct Timing Mark On '51 Studebakers

A RECENT service bulletin from The Studebaker Corp. stated:

The boxed inserts in the accompanying illustration are designed to show the difference in location of the IGN marks used for timing on the Commander-6 (17A and earlier) and Champion (10G) engine, and the Commander (H) V8 engine

The Champion and Commander-6 timing marks are best seen from the left and slightly to the rear of the vibration damper; the Commander V8 marks are best seen from the front of the car.

To avoid the possibility of using the wrong mark for timing, mechanics should be advised of two things: (1) the correct timing



IGN mark is the straight line immediately following the letters IGN (to the right of the letters as they are read) on the edge of the vibration damper flywheel; (2) this mark should be painted yellow or white. If paint has accidentally entered any other mark, it should be removed. If the IGN mark does not stand out clearly under the neon timing light, it might be advisable to polish the area clean with sandpaper and then chalk the letters IGN, as well as the mark immediately following them, to make them more prominent.

In the illustration the heavy black arrow points out the IGN mark as it is seen on each vibration damper flywheel.

The numeral "1" indicates vibration damper, "2" indicates the pointer and "3" the IGN mark.

Shopping during the week puts 53 per cent of the cars in this country to work, the Automobile Manufacturers Association says in a new report.





New Business Openers!



Pretty fancy gadgets—these newfangled can openers! Work fast, too. But according to all reports from the field, it is still the can you open—not the opener—that makes the difference in pleasing customers and salting away steady motor oil profits.

When you open a can of Quaker Stare for a new customer, you open your books to receive steady income. Proof of this are some of the most amazing repeat business statistics in the entire oil trade.

For example—3 out of 5 have been steady customers for more than five years; six out of ten surveys showed Quaker State in the top slot position. Then, a leading national magazine made a survey which proved Quaker State the undisputed first choice.

Have you considered stocking Quaker State? Get the facts from us today.

If the car manufacturer recommends Heavy Duty Oil with detergency —use Quaker State HD Oil.

QUAKER STATE OIL REFINING CORPORATION, OIL CITY, PA. MEMBER PENNSYLVANIA GRADE CRUDE OIL ASSOCIATION

Diagnosing the Powerglide

(Continued from page 88)

tion of oil.

f. Sand hole in suction bore in transmission housing or case, permitting aeration of oil.

g. Sand hole in suction cavity in valve body, permitting aeration of oil.

Difficulty in Shifting from Drive to Low and from Low to Drive

This trouble can be caused by an improperly drilled high clutch feed orifice in the valve body. Oil restriction at this orifice would result in slow application of the clutch with the selector in drive range. When shifting from drive to low the oil return to the sump from the clutch and release side of the low servo would be slow due to the restricted orifice.

The above condition can be easily diagnosed by connecting pressure gauges to the low servo apply and the high clutch (release side of low servo) test points.

a. Move the selector lever from

neutral to drive with the engine running at idle speed, and watch the action on the two gauges.

If the pressure builds up much more rapidly on the gauge connected to the low servo apply than on the gauge connected to the high clutch, restriction in the passage is indicated, which more than likely is due to an undersized orifice.

b. Move selector from drive to low and watch the action on the pressure gauge connected to the

high clutch.

If the pressure drops rather slowly, the oil is being restricted in draining from the clutch and release side of low servo. This results in clutch drag and slow low band application.

Slipping and Chatter in Low Range

This condition may be caused by poor ring fit or broken ring on the low servo piston. This allows oil to leak into the clutch apply circuit in greater volume than the high clutch orifice can handle, resulting in sufficient pressure being built up to partially apply the clutch at the same time that the low band is being applied.

The above condition can be easily diagnosed by connecting pressure gauges to the low servo apply and the high clutch (release side of low servo) test points.

With the selector lever in low range and the brakes set, accelerate engine to stall speed and check the pressure on both gauges. If everything is normal the gauge connected to low servo apply should register from 160 to 200 pounds and the gauge connected to high clutch should register zero.

However, if the gauge connected to the high clutch registers pressure, oil is leaking into the clutch apply circuit.

High Clutch Failures (Burned Plates)

In case of high clutch failures the transmission should be checked very closely both before and after disassembly.

With pressure gauges connected to low servo apply, high clutch and reverse servo test points, check the following:

a. With selector lever in drive, check for slow build up of pressure on gauge connected to high clutch. Slow build up of pressure would indicate restriction in high



FRAM Radiator & Water Cleaner Helps You Tap Huge New Market



\$100,000,000 A YEAR spent on cooling system repairs proves the need for cooling system protection is vital! The Radiator & Water Cleaner is a "natural" for this market! And giant billboards from coast to coast plus powerful consumer advertisements tell motorists about this new Fram development . . . send them to you via Operator 25.



RUST, SCAIS AND DIRT particles are trapped inside the Replacement Cartridge of the new Fram Radiator & Water Cleaner. Just a twist of your wrist changes the cartridge when expended. What's more, it's economically priced for easy selling!

FITS CARS, TRUCKS, TRACTORS. Quickly and easily installed. Uses standard heater hose for all connections... all other parts in ready-to-install kit with every Radiator & Water Cleaner. And remember—you make one profit when the Cleaner is first sold, repeat profits on Replacement Cartridge sales from then on! Contact your Distributor for details.

For More Profit . . . More Good Will, Sell Fram Complete Engine Protection

Your customers get real protection and you're assured of repeat sales when you sell Complete Engine Protection. Build good will and profits with the line that's proved . . . in the laboratory . . . on the road! SELL Fram Filters for Complete Engine Protection!

Fram Corporation Providence 16, R. I. In Canada: J. C. Adams Co., Ltd., Toronto, Ontario clutch apply orifice which would result in clutch slippage.

b. With selector lever in low, check for pressure on gauge connected to high clutch. If any pressure is shown, leakage past the low servo piston ring is indicated which would result in partial application of the clutch.

c. With selector lever in reverse, check for pressure on gauge connected to high clutch. If any pressure is shown, leakage is indicated between the converter out and low servo release chan-

nels in the valve body or a damaged housing to valve body gasket.

When the transmission is in reverse the clutch plates are rotating in opposite directions, the drive plates are revolving at 2.43 times the driven plate. So being the case, a very slight clutch drag would then soon burn out the clutch.

Note: The valve body should be carefully checked for porosity or sand holes or a damaged gasket between transmission housing and valve body. Unable to Shift into Reverse with Engine Running

The transmission cannot be shifted into reverse with the engine running but can be shifted into reverse with the engine shut off. This condition is usually caused by the accumulator snapring being out of place, allowing the accumulator valve and the valve body to be forced against the clamp nut on the parking lock lever shaft and apply spring assembly by the hydraulic pressure, thereby blocking the shift into reverse.

The shift can be made into low because the clamp nut is not aligned with the accumulator valve and valve body when shifting into low range.

Steam-Cleaning Service (Continued from page 68)

and a little originality in advertising and promoting its use started the ball rolling, and an intelligent and aggressive follow-through with prompt, courteous service at the pumps and in all departments brought about results that were most gratifying to Mayo.

Let's get down to some specific figures on this operation. While the total increase in volume the first year Mayo had the station was only about 20 per cent, at the end of the three and one-half years he ran it, he chalked up an increase 70 per cent above what the place was doing when he took

over.

His first year's volume on steam cleaning alone was \$3,600. His price for the "steam greasing" job was \$7.50. This consisted of a chassis steam cleaning and a lubrication job. For the first year this gave him an average of 40 jobs a month. The highest monthly volume he ever reached was \$600 and his worst month on steam cleaning ran about \$200.

Also, the profit side of this picture was pleasant to look at. An analysis of his cost showed that his total expense for cleaning compound, lubricant and depreciation on his equipment was \$1.66 per job and his labor cost \$1.50, or a total of \$3.16. He ran his advertising daily all during the time he operated the station, which brought his cost figure to \$3.66, leaving him \$3.84 profit margin per job.

You don't have to be a college professor to figure how long it



from RAM HEAD to BASE...a real truck drivers jack!



Hein-Werner Hydraulic Jacks are built for heavy duty service

Take a tip from truck drivers who speak from experience. You can't beat Hein-Werner Hydraulic Jacks for ruggedness, ease of operation or dependability . . . Made in models of 1½, 3, 5, 8, 12, 20, 30, 50 and 100 tons capacity.

Ask your jobber, or write us, for details.



THE HEIN-WERNER line of hydraulic jacks is COMPLETE! It includes "Bumper-Lift" Hydraulic Jacks for passenger cars. Under-Axle Jacks fer trucks and buses. "Swift-Lift" and Service Jacks fer shop use. Push and Pull Hydraulic Jacks fer body, fender and frame work.

HEIN-WERNER CORPORATION . WAUKESHA, WIS.

took Mayo to pay for the steam cleaner at this rate, or perhaps we should say for the cleaner to pay for itself. On his first year's steam-cleaning volume of \$3,600 he showed a gross profit of over \$1,800. At the end of 18 months he sold the old workhorse that had enabled him to hang up this unusual steam-cleaning record and purchased a new-model machine. Incidentally, he got \$250 for the old outfit, which is still in service in a small garage.

There is another profitable

service now in general vogue in most modern service establishments which Mayo got into on the ground floor as a result of having a steam cleaner, and that is the application of undercoating. When the many advantages of this service became apparent and car manufacturers started advocating it as a road-sound deadener and preserver of under-carriage parts, he installed at a very nominal cost the equipment necessary to do this work. This tied in perfectly with his chassis-cleaning

operation and proved to be very profitable.

While Mayo is very modest in speaking of his accomplishments in taking this station when it was just about on the ropes and making such a good showing with it, he frankly admits that the biggest contributing factor to his success in this instance was his decision to buy a steam cleaner.

He recently sold the station where he made the excellent showing covered in this dissertation and is now in the large station pictured with this article. It is located on Route 17 and 92 at the boundary of two busy central Florida communities, Orlando and Winter Park.

His facilities now include complete service to long-haul trucks and drivers, in addition to everything that local motorists desire. But he is not satisfied with the present plant and equipment and his plans for remodeling the building are already on the board and will be carried through to completion when government restrictions are lifted.

The writer has seen the list of new equipment he is going to purchase. Needless to say, there is a steam cleaner at the very top of this list, and Mayo says that among his first promotional activities, when his modernization plans are all carried out, will be another "steam greasing" campaign. He says that it may be a catch phrase but that it's a good one even if he did coin it.

Furthermore, he says that if any of you readers want to use it you are welcome to grab it and run, and that he hopes you will be able to gain the same sales and profit yardage with it that he did.

B. W. Wilkins Will Head Reo's Atlanta Branch

BARTO W. Wilkins has been appointed branch manager of the new Atlanta, Ga., branch of Reo Motors, Inc., it has been announced by A. L. Struble, general sales manager. Formerly sales manager of the Bus Division, Wilkins has been with Reo since 1919.

The branch is at 956 Marietta Street, headquarters of the former Reo truck distributor in Atlanta.

Oil marketers collected more than \$2,000,000,000 in gasoline taxes in '50, states and federal.





Automotive engineers choose Delco batteries for original equipment because they know Delcos are dependable . . . deliver starting power when needed.

THE NO. 1 REPLACEMENT BATTERY!

Delco batteries are the choice of millions of car owners. For reliable starting power . . . for long life . . . America knows that Delco's the buy.

DELCO BATTERIES - A UNITED MOTORS

Available Everywhere Through United Motors Distributors



"Blitz" Training Pays

(Continued from page 81)

Phelps advises pulling the man off the specialty for brief periods daily and teaching him the next operation, like cylinder boring, cylinder grinding, rebabbiting, differential work and clutch work.

A repair shop can apply the blitz training in similar manner by starting an apprentice mechanic at general brake work and giving him intensive training for four weeks so that he can take care of the average brake job that comes to a shop. Pulling him off brakes from time to time, he can be taught valve work, minor carburetor or electrical work, fuel-pump repairing and rewiring.

Another repair shop may find it more profitable to take an apprentice off brakes to teach him engine rebuilding, carburetor and electrical work, front-end work, clutch work, transmission and differential.

"The important thing is to have

a definite and planned step-bystep procedure that both you and he are following," stressed Phelps, "because it gives the trainee a sense of order and progress. It stimulates him to prove skillful at that job as quickly as he can so that he can get that pay increase just ahead. This is no haphazard, hit-or-miss arrangement. If he sees that you are proceeding in an earnest professional manner, he feels that he is getting somewhere and he will stick by you."

Phelps recommended calling in a representative of the local apprenticeship council or writing to the state apprenticeship agency for assistance in meeting the problems of blitz-training manual and mechanical workers on the job to suit a shop's particular needs.

"I think apprenticeship training is a wonderful thing," commented Ellis Shortt, now a fullfledged machinist who was the first to get his apprenticeship certificate from Phelps-Roberts under the D. C. apprenticeship program. "It's not learning a little bit of this and a little bit of that, and coming out half-finished with a smattering of skills. You feel you're getting somewhere. You've got a better chance when you go out on your own. And now that a fellow can get top pay in 18 or 20 months, apprenticeship training is even more attractive than ever.

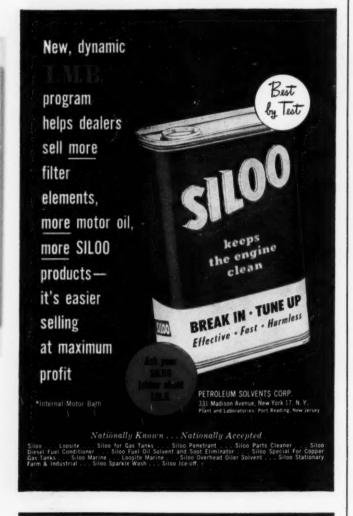
Phelps indicated an added attraction. A registered apprentice will be given the same consideration for deferment given a college student under the Selective Service Act, provided he has made satisfactory progress and a request for his deferment is put in by his employer.

Phelps-Roberts gives a trainee a 30-day "wait-and-see" period before registering him. They plan extending blitz training to all departments as the need arises but foresee the difficulty in the parts department, where they have had men with mechanical or machineshop experience.

With the high-school graduate and the new man just entering the industry as the only sources of labor an employer can draw on to train, blitz training may become the solution in the present

emergency.

Automotive taxes provided almost a third of all state tax revenues last year, the American Petroleum Institute said.



Singers and Sluggers Sell (Continued from page 75)

modern showroom reminded of the team, a uniform is displayed on the table containing advertising pieces on cars.

Burnett is quite enthusiastic about the ball team as a force for promoting sales indirectly. All of the players on his team pull for his organization.

At every game Burnett, as manager, wears the uniform. After the game he buys refreshments for all players.

Much valuable free newspaper space is won through the activities of the team. During season, the sports page of the local paper carries many inches of news and promotional matter concerning the team.

"Advertisers in local newspapers who do not take advantage of such space are missing profitable publicity," Burnett asserted. "Of course, the editorial department prefers stories of news value, which is what we supply with our team."

He has found that the buying public responds to planned publicity that solicits the aid of the readers in winning, whether the contest is a softball tournament or a dealer sales contest.

In the most recent Hudson contest, in which Burnett placed second, his large-space advertisement kept readers informed of the contest standings. After telling readers about the high trade-in allowance he offered, he personalized the advertisement with this:

"If we come out on top Saturday (in the contest), there's a free vacation for us at White Sulphur Springs. West Virginia. And we like a vacation, too. But time is running out . . . Tuesday . . . Wednesday, Thursday, Friday, Saturday . . . just 5 more days for you to trade high and help Burnett Hudson Sales to win."

Burnett gives his salesmen training in using the telephone skillfully as a sales aid. Every day each of the four men makes from ten to 15 telephone calls.

"That helps the men to get around quicker," Burnett stated. "It is especially valuable in weeding out prospects who will not buy immediately. A skillfullymade telephone call often reveals whether the prospect is ready to buy immediately.

"If the salesman thinks that a sale cannot be made within a week, the customer's name goes into a hold file. We do not discard the names, but hold them for contacts within 30 days and 60 days. Our records show that ten per cent of the names in this hold file turn active."

Burnett's slogan, used extensively, is "You Shop It—We'll Top It." When a customer is ready to trade in his car, the salesman asks him what he wants for it. The asking price is usually

too high, of course. Then the salesman makes an offer, and asks the customer to get bids from other dealers. "We'll top your highest bid," he concludes.

Burnett believes that personality in the sales approach will count for more than ever in the months to come.

"If I add new men to the sales force, I'm going to pick the fellows who will be able to attract the greatest amount of favorable public attention to our organization," he said.



Westinghouse"Y" Compressor

When you buy a new compressor—be sure you get just A-I-R and not R-E-P-A-I-R. That "R-E-P" is the cost-liest part of your air supply.

liest part of your air supply.

The Westinghouse "Y" is designed to ban the greatest single cause of repair bills—failure to oil. When the oil level in the "Y" gets too low, the compressor refuses to load. This forewarning lets you take care of lubrication before any damage results. The "Y" unloads if the oil level drops during operation.

Westinghouse "Y" compressors offer every modern feature,—automatic pressure control, pressure lubrication, multiple "V" belt drive, fully enclosed crankcase,—plus the three protection-features listed at right. Full range of sizes: 6.2 to 68 CFM displacement, 1½ to 15 hp., horizontal or vertical tank. Gas engine drive also available.

You can't afford to gamble on uncertainties today . . . be sure of a dependable, economical air supply, with a Westinghouse "Y".



Only the
Westinghouse "Y"
gives you
ALL THREE

Lew Oil Level Protection—No Oil—No Air, bans wear and repair.

Thermal Overload Protection
—Standard, at no extra cost, on

Starting Unleader—Compressor remains unloaded till speed and oil flow are normal.

Westinghouse Air Brake Co.

Industrial Products Division—WILMERDING, PA. Factory Branch: EMERYVILLE, CALIFORNIA ASK FOR BULLETIN IDC 9302-3.

DISTRIBUTORS THROUGHOUT THE UNITED STATES . . . CONSULT YOUR CLASSIFIED DIRECTORY DISTRIBUTOR IN CANADA: CANADIAN WESTINGHOUSE CO., LTD., HAMILTON, ONTARIO



The dynamometer drawbar is shown attached to a Studebaker car that is ready for a road test.

Studebaker Uses Drawbar For Road-Load Tests

A UTOMOTIVE engineers often devote themselves to slowing down, not speeding up, the cars they test.

That's the word, at least, from Studebaker, whose engineers have designed and regularly use at their 800-acre proving grounds a trailer apparatus solely intended to slow down all efforts of the test car or truck pulling it.

Studebaker engineers call it the "dynamometer drawbar" a n d with it they can produce roadload effects of a variety of abnormal road surface conditions. With different adjustments of rheostats (coarse on the unit and finer in the car), they can duplicate the resisting equivalent of deep, loose sand, clinging mud, steep hills or long upgrades by using this mechanism.

Electrical current from standard batteries at the front of the unit flows, under control of the rheostats, to the eddy-current dynamometer just behind the car bumper. This dynamometer sets up a strong retarding or slow-down force which is applied to the wheels of the trailer by connecting drive shaft and axle. This slow-down force results in a carefully calculated drag on the efforts of the car motor to pull forward.

The load of rough cast-iron bars in the trailer box is regulated to hold the trailer tires in constant traction with the road surface, thus avoiding skidding or slippage.

The drawbar is used at the proving ground primarily to set up various engine load conditions for testing the cooling efficiency of cars and trucks by the Studebaker technicians.

Depending on slow-down adjustment, speeds with accelerator right to the floor may vary from 20 to 60 miles per hour and running periods are anywhere from one to five hours. Under such strenuous conditions, not only the cooling system but every moving part of the car is under constant stress. Careful observation during such tests reveals much useful information to engineers.

We don't hide behind our factory guarantee

publicize it!

Guarantee of Service

This Shurhit Ignition Repair Part is guaranteed to give satisfactory service. If it does not come up to the expectation of the purchaser in every respect, it may be returned to the factory and we will replace it without charge and pay the carriage charges both ways.

Shurhit Products, Inc.
Waukegan, Illinois

Every manufacturer KNOWS the quality of his product. If you want to know how much confidence he has in it . . . LOOK AT THE FACTORY GUARANTEE!

Every Shurhit employee . . . from the purchasing agent to the bench inspector on each individual assembly line . . . takes pride in helping to maintain Shurhit's established reputation for DEPENDABILITY.



SHURHIT PRODUCTS, INC.
Weekegen, Illinois

★ YOU can stake YOUR REPUTATION on SHURHIT IGNITION!

COLOR-CODED WIRES - for instant,

GUARANTEED ALL-WAYS FOR THE LIFE OF THE CAR:

fool-proof

identification

- Guaranteed positive self-cancellation every time
- Guaranteed not to slip
- Guaranteed not to require readjustment
- Guaranteed burn-out proof
- Guaranteed no wheel drag
 - for the life of the car

NOW — the most beautiful, most dependable turn signal on the market is also the easiest to install! With the new snap-in tips and color-coded wires, installation time is greatly reduced. Order the new and improved Yankee conversion kits and switches today. Send for catalog. Yankee Metal Products Corp., Norwalk, Connecticut.

Switch-Pat. Pend.

YANKEE MILEAGE-MINDED ACCESSORIES



CONVERSION KIT

with the positive

SELF-CANCELLING

- for quick

connection of wire terminals

SWITCH

Almost kalf the Pre-sold

MORAINE ENGINE BEARINGS are specified as original equipment for all General Motors cars and trucks. Today, official registration figures show that G.M. vehicles make up more than 42 per cent of the total registrations for the entire United States. Yes, MORAINE ENGINE BEARINGS are bearings made to order for this vast pre-sold General Motors replacement market!

And That's Only Part of The Story . . .

Moraine makes available replacement bearings for many other makes besides General Motors—in fact, for most of the nation's thirty-five to forty million motor vehicles! By stocking up on MORAINE ENGINE BEARINGS you can supply highest quality precision replacements for a very wide range of makes and models.

NEW AND DIFFERENT

The revolutionary Durex-100 Bearing—new and different—the modern bearing designed for today's modern motor cars, makes the Moraine line more complete than ever.

Moraine brings you this brand new innovation that truly makes Moraine the complete line as well as the ORIGINAL EQUIPMENT LINE.

FOR YOUR FULL SHARE OF THESE VAST EXPANDING MARKETS—

nation's owners are Moraine Prospects

The Bearing **High Compression Demanded.**

Original Equipment on Cadillac, Buick, Oldsmobile, G.M.C. and Other Leading Makes of Cars and Trucks

Modern engines call for modern bearings . . . bearings able to withstand the tremendous loads imposed by stepped-up speed, higher engine compression. DUREX-100 engine bearings by Moraine provide the perfect answer to these new, tougher requirements. They're the bearings that were precision-engineered by Moraine for the new higher compression engines. In fact, scientific road tests showed Durex-100 engine bearings far outlasted conventional types.



THE MATRIX

MAKES THE DIFFERENCE

DUREX-100 embodies an entirely new and revolutionary idea in bearing design. The difference lies in the copper-nickel middle layer, and in the method used to bond it to the back. This middle layer (or matrix) permits the use of a very thin (hence more flexible) babbitt overlay. Fatigue resistance and ability to withstand load pressures without displace-ment are thus greatly increased.

EIGHT WAYS BETTER!

- Greater Resistance to Fatigue
- Increased Load Capacity
- Greater Conformability
- Better Embedability
- Stronger Bond
- Greater Resistance to Scoring
- Greater Resistance to Corrosion
- More Durability

MORAINE PRODUCTS

GENERAL MOTORS

DAYTON, OHIO

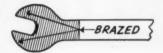
A UNITED MOTORS LINE

Order MORAINE **Engine Bearings Now From Your** UNITED MOTORS DISTRIBUTOR

GOT A GOOD IDEA?

will be paid for every time - saver or shop short - cut accepted for publication in this section. A photo or rough sketch will make your idea more valuable. Only original items, not previously published, offered for our exclusive use, can be considered. Send them to: Southern Automotive Journal, 806 Peachtree Street, N. E., Atlanta 5, Ga.





wrench. This way I have a dou-

ble thickness head that will not

slip.-Woodrow J. Cunningham.

I have solved this problem for myself by cutting a lug wrench and then welding a 1/2" pipe, 12" long, to it, as illustrated in the diagram. By doing this the wrench is longer, thus getting it

Adjusting Valve Tappet On Plymouth Models

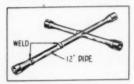
WHEN adjusting valve tappets on Plymouths and Chrysler sixes, I had difficulty with my 7/16" tappet wrench rounding the corners off the valve tappet adjusting screw. Some of them are very tight, especially on new motors.

To remedy this, I took an old 7/16" tappet wrench, cut off 11/2" and brazed it on my regular

Box 197. Blackburn, Missouri. Stopping Lug Wrench

From Hitting Paint

In My work I have discovered that in using a regular lug wrench for removing the rear wheels of a Hudson, you cannot keep the wrench from hitting the paint.



away from the car so as not to scuff the paint.-Submitted to the Hudson Service Merchandiser by Dalford Huff, mechanic with Sloop Auto Sales and Service, High Point, North Carolina.



More than 200 automotive parts to help you lick service problems. Each part has been developed to meet a definite need requested by repairmen who want to do the job right. Champ-Items are engineered for Easier Service - Better Performance -Safer Driving. Yes, they are Time-Savers - Money-Makers for you.

copy of the new Champ-Item catalog? A request on your letterhead will start one on its way to you.



ORDER FROM YOUR JOBBER

CHAMP-ITEMS, INC.

for BETTER BATTERY SERVICING

You'll want these Champ-Items

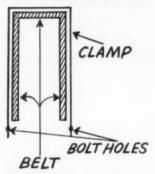
- No. 445 Adjustable Battery Hold-downs (3 sizes) fit most cars. 445A - 9¼"x7¼"; 445B - 10½"x7½" List 90c each. 445C - 19½"x4¼" List \$1.00 each.
- No. 468 Battery Support Tray for Chevrolet 1940-48, List \$1.50 each.
- No. 522 Universal Battery Hold-Down Bolt for all cars and trucks. List 25c each.
- No. 565 Four-Flange Battery Carrier Box for Chrysler Makes, List \$3.00 each.
- No. 956 Battery Post Shim, List 5c each.



Removing the Squeak From Rear Springs

Here's a cure for squeaking rear springs on Chrysler eight-cylinder models:

Since the springs are not covered, the clamps have a tendency to put up an annoying squeak even



on smooth pavement. To stop this, I remove the clamps, of which each spring has three—one on the front half and two on rear half.

Then I use a piece of flat belt, no more than two-ply thick. Cut it two inches wide and long enough to cover top and sides of spring. Then slip clamps on. Sometimes it is necessary to use longer bolts.—Woodrow J. Cunningham, Box 197, Blackburn, Missouri.

When Repairing a Short In Steering Column

O^N 1950-51 Mercurys where a short or ground can be located definitely in the steering-column loom, the trouble spot usually will be found about six inches below the top of the column, where the shift-lever column chafes the insulation of the wires.

To repair this, it is not necessary to remove and replace the entire loom, which is a vexatious and time-consuming job. Simply disconnect the wires at the lower end of column, disconnect horn wire at top and remove turn-signal switch screws. Pull out about eight inches of loom, being careful not to allow wires at lower end to enter column and be lost.

Inspect wires carefully for chafed insulation at point about six inches from top, repairing with black plastic tape. The ends of wires left protruding from lower end will allow loom to be pulled back into column. The whole job can be completed in a matter of minutes.—Lynn F. Snoddy, 1622 Vivian Street, Shreveport, La.

Replacing Speedometer On '51 Hudson

WHEN replacing speedometer or clock on the 1951 Hudson, grind slots in the bottom two ears. Start the bottom two screws, then slide the instrument on the screws, which makes it easy to locate and start the upper two screws.—Submitted to the Hudson Service Merchandiser by

John Helegda, mechanic with Euclid Mayfield Motors, Inc., Cleveland. Ohio.





Thousands of progressive automotive repair shops are the lucky owners of this famous Lamson Automotive Treasure Chest. We say "lucky" because these chests are almost impossible to buy nowadays, in view of the steel shortage. If you have one or more of these chests, it's wise to replace the fasteners as they are used. Or, if you stock in some other way, don't wait until the last minute to re-order. Automotive fasteners are in short supply so it pays to keep ahead.

Lamson & Sessions, the world's largest manufacturer of automotive fasteners, is continuing to bend every effort to fill your fastener needs.

The LAMSON & SESSIONS Ca.

General Offices: 1971 West 85th Street • Cleveland 2, Ohio

LAMSON & SESSIONS



Vapor Lock Is Covered In Studebaker Tips

VAPOR lock in the fuel system of 1951 Commander (H) models in hot weather was covered in a recent service bulletin by Studebaker. It said:

During extremely hot weather, you may find a condition of stalling and subsequent hard starting which appears to be caused by a vapor lock in the fuel system.

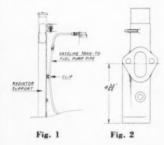
If you should encounter such a condition, we suggest you check

the car as follows:

1.—Air Leak in Fuel System: Check for air bubbles in the fuel in the fuel pump bowl. If present, check the gasoline system flexible line leading to the inlet side of the fuel pump to make sure that the connections are tight. The absence of fuel leakage at these connections is not conclusive evidence that air leakage is not occurring under suction. Retighten the fittings or replace the flexible line as necessary to eliminate air leaks.

Another place to look for air entering the fuel system is at the fuel pump bowl. The bail nut may be loose or the gasket may not be seating properly. Adjust or replace the parts as required. Tightness of all other fuel inlet line fittings should be checked if bubbling in the fuel bowl continues after these previous checks and corrections have been completed.

2.—Gasoline Tank - to - Fuel Pump Pipe: It is important that the gasoline pipe running from under the frame up along the radiator edge to the fuel pump flexible coupling be held in the clip provided on the radiator core



support (see Fig. 1) and also be held away from metal-to-metal contact except within the clip. If this pipe is not held by the clip, it may move over sufficiently to pick up added heat from the radiator core air and cause fuel vaporization in the pipe at that point; similarly, if this pipe rests against the radiator, vaporization from heat transference may result. Make corrections as indicated by your inspection.

3 .- Fuel Pump Stroke: After any air leaks in the fuel system have been eliminated, and the gasoline tank-to-fuel-pump pipe is properly positioned, if the stalling condition continues, it is possible that the fuel pump stroke may be inadequate due to the mounting holes on the support being too high. The bottom of these holes should be not more than 4-33/64" from the base of the fuel pump support casting (see Fig. 2). If the bottom of the mounting holes is higher than 4-33/64", replace with a new fuel pump mounting support, part No. 529122, known to be correct as to this dimension. Note: With the fuel pump support removed. be sure to check the fuel pump push rod for being bent or for evidence



"PM" PIN FITTING MACHINE
M" scientifically engineered KING PIN FITTING with K-P

"PM" scientifically engineered pneumatic-hydraulic Pin Fitting Machine for boring piston pin holes in Pistons and Connecting Rods—Rocker Arms—Brake Cylinders— and Steering Sectors.

ACCURACY - SPEED

TOBIN-ARP MFG. CO. 2845 Harriet Avenue Minneapolis 8, Minn.

With the Best!

moving brake flanges.

Attachment for precision fit-

ting of front wheel spindle

king pins . . . from 34" to

112" diameter without re-



"The Auto-Lite Spark Plug line with an outstanding sales leader like the famous Auto-Lite Resistor Spark Plug is the best bet we have to offer our dealers. Auto-Lite sales have climbed steadily over last year and they're still going up . . . it's a great line for building profits!"

Ol. Withell TREASURER R. I. MITCHELL, INC. AUBURN, MAINE

"Out here on the coast, we recome ago the advantages of the Auto-Lite Sgark
Plug line. Where else can we get a deal
that has so many top-notch features to plas
on to our dealers? Auto-Lite is showing a
the way to make real profit."

PRESIDENT HENDERSON BROS. SACRAMENTO, CALIFORNIA



FROM MAINE TO CALIFORNIA JOBBERS ARE SAYING:

When the chips are down O·LITE is the li

. because Auto-Lite gives you the only complete line of spark plugs for maximum sales!

in the automotive after-market — sensational, big-time radio and television "Suspenset" nd television "Suspensel" nows — colorful national ads America's leading publica-ons — exclusive AAA tis-in — past to coast highway signs — big, ready-made market af g, reasy-made marker or -Lite equipped cars — sure-fire promotion and fie-in material — everything inseded to draw new cus-tomers in—make 'em buy,

You'll find it pays to be an Auto-Lite Registered Service Dealer (RSD) . . . pays in sales . . . in volume . . . in maximum profit. Only Auto-Lite volume . . . in maximum profit. Only Auto-Lite gives you a complete spark plug line—the Standard Spark Plug, ignition engineered to give unbeatable performance . . . the Transport Spark Plug for lowest cost per mile of spark plug operation in heavy-duty service . . . the Resistor Spark Plug with new advantages. Capitalize on this profit-making deal that only Auto-Lite offers. See your jobber or write to

THE ELECTRIC AUTO-LITE COMPANY

SPARK PLUGS







TRANSPORT

All 3 have been selected by leading automotive engineers as original factory equipment on millions of America's finest cars, trucks and tractors

of scoring. If the rod is bent, replace the rod, part No. 529123. If the rod is scored, polish affected areas until the rod slides freely

in the guide bore.

4.—Fuel Pump: If items 1 through 3 check satisfactorily, test the pressure of the fuel pump at the outlet on the pump and with the fuel line disconnected from the carburetor. This should be from four to five pounds per square inch. If pressure is outside these limits, repair or replace the fuel pump.

Inspection Boosts Sales (Continued from page 66)

time saves nine." In taking care of that repair now, a customer will save money on heavier bills later. We offer to pick up the car and have it ready for the customer on his way home from work. In 50 per cent of the cases the customer agrees to let us carry out the jobs.

On some later Tuesday or any other day when we map out the next day's work, we do not overlook the customer who may have turned us down twice. A third try may bring him in.

In a town this size our service manager has the added advantage of knowing each customer and his car, and personal contact has put the relationship on an easier and friendlier basis. So he does not hesitate calling a customer again.

We steadily build toward this closer relationship right from the start. Buser makes it a practice to learn the customer's name and uses it in addressing him.

It helps pave the way all along the line in our dealings with the customer.

Building "Quality" Trade (Continued from page 74)

I guarantee against chipping, fading or discoloring. Other shops advertised the same prices I did. But after a while some of them started cutting.

"I noticed that one of my best commercial paint customers with a fleet of vehicles hadn't been around for a long time and I questioned him about it. He replied that he was getting his painting done cheaper elsewhere.

"I began losing other customers for the same reason. I was tempted to out-cut competition and get the business back. But on second thought, I knew I couldn't back my work with as strong a guarantee as I had been giving and stay in business on a cut-throat system. So I still held the line on my paint prices and while I continued losing a customer now and then, I gained others who thought more in terms of quality than price.

"I held the line until the performance of my work had a chance to stack up against that of some price-cutting competitors. It was then that my determination to build slowly on quality-conscious customers, rather than boom rapidly on a price-tag patronage,

really paid off."

Phelps' present facilities are taxed so heavily that he is doubling his 6,400 square feet of floor space with a new addition in the rear. His shop is jammed with body, fender and paint jobs. Frequently there are 30 or more cars on an adjoining lot awaiting turn. He still has his original schedule of paint prices, with proportionately untampered prices in other kinds of work.

He is developing maintenance



Here's a complete line of truck mirrors to fill every fleet requirement, from the smallest panel truck to the mighty cross-country carrier — engineered and built to cut image shimmy and blur — to provide clear, safer rear vision. Lightness of mirror head, strength of mirror arm and rigidity of mounting bracket practically eliminate normal vibration and whips. Speaker brings you practical design, utility and durability . . . a boon to driving safety.

Features: Feather-light aluminum alloy mirror backs

* Weather-Sealed mirror heads in 5 and 6 inch
round and 4 x 8 and 6 x 8 inch models * Doublereinforced ball socket and rubber gasket * Clear,
non-glare or polarized glass * Steel or rubber doors.

Speaker DuckSback Mirrors surpass all existing specification requirements for durability and safety.

J. W. SPEAKER CORP., Milwaukee 12, Wis.

DUAL-VISION VANETT MIRRORS
For use where driver may operate
position. Two 5" round aluminum
mirror heads mounted on 8" Tshaped aluminum-enamel finished
arm. Panel mounting bracket. An
original equipment type mirror now
supplied through jobbing channels.

DISTRICT REPRESENTATIVES — Iowa, Missouri, Kansas and Nebraska: Robert O. Dickey Co., 8101 Lee Blvd., Ransas City, Mo.; West Virginia: E. L. Dye Co., 57 E. Main St., Norwalk, O.; Deleware and Maryland: Bert Reves, 1126 Cathedral St., Baltimore 1, Md.; Kantuck Spindler's Sales Co., 3660 W. 16th St., Indianapolis, Ind.; Arkansas, Louisiana, Okiahama and Taxes: H. A. Wholey, P. O. Box 8186, Dallas, Tex.

"It does just what the advertising

reports H. C. Wilson 2997 "I" Street San Bernardino, Calif.





"The most helpful thing about the Hygrade System is the manual," says Mr. Wilson. "It has cut my bench time for rebuilding a carburetor down to about 30 minutes; certainly does just what the advertising says."



"Have I noticed any increase in my carburetor business since opening my Hygrade rebuilding dept.? Definitely yes—about 40% more. Customers have more confidence when they know you're a carburetor expert."



Includes the priceless Hygrade Manual, assortment of 20 kits to repair all Chevry, Plymouth, Ford carburetors: all the tools and equipment you need; cabinet; a continuing bulletin service; metal signs, outdoor banner, etc. (This outfit is worth over \$10.0,0.

Better your business all around by rebuilding carburetors in your own shop. You build a name for A-1 motor repair work by knowing carburetors inside-out. You can stake your reputation on a rebuilt because you know you put in all new parts. And you make more profit on every carburetor job. Find out how the revolutionary Hygrade system can make you a carburetor expert in one week's time. Write today for free booklet. HYGRADE PRODUCTS DIVISION, Standard Motor Products, Inc., 35-35 Thirty-fifth Street, Long Island City 1, N.Y.

HYGRADE

FINGERTIP SYSTEM of CARBURETOR REBUILDING

by the makers of Blue Streak Ignition Products

work on commercial vehicles which get regular unestimated service and the owners are billed for the jobs.

Phelps never knocks a pricecutting competitor. "Don't blame the man who painted this car for you," he said one day to a disillusioned customer who had tried a cheap paint job somewhere else and then came around to get Phelps' baked - enamel service. "He gave you just as good a job as the price you wanted to pay would permit. At that price he couldn't afford to stand back of his work as I do and stay in business. You are not treating yourself right to pay a service shop a price that may mean it will be out of business a few months from now if your paint job shouldn't stand up."

Body and fender work is, of course, something that is hard to standardize on prices. This is especially true on wreck jobs. Phelps, however, inspires confidence in his prices by going over the work to be done with a doubtful owner item by item, with the cost of each. If there is a minor scratch or damage that doesn't affect car performance and is not especially noticeable he may suggest not spending anything on it. Or he may offer to save money by replacing some part with a used part from another car.

"Before going into garage work," he explained, "I was a foreman on different types of building construction. I had many men under me. I made it a practice never to tell any of my men whether a job was being handled on a cost-plus basis or a straight bid. I didn't want it to affect their work. I believe in the same kind of conscience in servicing cars."

\$10 Brings Back Customers

(Continued from page 72)

one else because he thought he would be treated fairer in event of future restricted production.

"Once we had this information, I took him our records of new units received and the actual percentage he had gotten. Needless to say, he returned to the fold."

Other sales incentive plans that have paid off for this dealership include a \$5 bonus on the sale of new block assemblies, a "grab bag" for which employees exceeding assigned quotas receive tickets entitling them to chances at prizes ranging from golf clubs to kitchenware, and additional two per cent commissions for used-car salesmen who exceed their assigned quotas.

"In this manner," Harris pointed out, "we can avoid a lot of 'dead spots,' keep our men busy and usually do not have to lay off employees during normally slack periods. And, of course, each of these special promotions brings us new customers.

"A spirit of competition makes selling easier for the person doing the selling. Many motorists patronize us to help their friends with a prize or bonus."

3,000,000th Hydra-Matic Made

The 3,000,000th automobile-type Hydra-Matic transmission was produced by the Detroit Transmission Division of General Motors August 7. Hydra-Matic was first introduced on 1940 Oldsmobiles. Cadillac adopted it a year later for its models.





Engines last longer... run better...with

MoPar

MICRONIC OIL FILTERS AND FILTER ELEMENTS

Because MoPar Micronic Oil Filters are made especially for Plymouth, Dodge, De Soto and Chrysler cars and Dodge "Job-Rated" trucks, you can depend upon them to reduce engine wear and improve performance.

Filtering capacity of MoPar Micronic Oil Filters is more than 3 times greater than that of ordinary filters. In fact, each MoPar Micronic Filter has a minimum of 571 square inches of filtering surface as

compared to only about 69 square inches for an ordinary filter.

No wonder a MoPar Micronic Oil Filter does a better job of removing dirt, grit, sludge, and other harmful elements!

So... for faster, more efficient filtering, be sure to use MoPar Micronic Oil Filters and Filter Elements. Remember... they're genuine Chrysler Corporation parts—factory-engineered, factory-inspected and supplied by Chrysler Motors Parts Corporation.

You can get MoPAR Micronic Oil Filters and Filter Elements from your nearby Plymouth, Dodge, De Soto or Chrysler dealer.



Bearings, Blisters

(Continued from page 71)

rear axle has been removed to make the job more accessible. Transmissions of that day were of the progressive type—that is, the gear-shift lever moved forward and backward only, making it necessary to feel or "find" each notch in shifting. The reverse notch might be front or forwards but in either case low came next, then second and then, of course, high for that type of car.

I can see Ray at the lathe, turning up flanged aluminum cups to be assembled into gasoline filters patented by one of our customers.

The home-made, two-stage air compressor is running. We are the only folks in town who furnish free air.

And powering shop machinery is a small steam engine, taking heat from a boiler that also furnishes heat in the winter.

The old ways are pretty fresh in my mind and some may say the old ways were pretty crude. But just remember, somebody had to come first!

Salesman Doesn't Sell

(Continued from page 73)

money. But I am not sure I am real happy with the service I've been getting. And I've heard about you and just wanted to meet you and look the place over."

By this time all three receiving lanes were full and cars were in lines into the street. It was the rush moment of the day. Customers were waiting in various stages of impatience. Conversations were rapid. There was an atmosphere of tension and urgency, except in Johnny Grossman.

Knowing there was not a nickel in it for him, he still took his time and made reassuring conversation. Any time he could be of help, he said, we should come right on in. The shop, he assured us, serviced other makes of cars in addition to the one sold. He made no effort to sell anything. He made no evident show of anxiety to get to another customer where there would be a commission. Did not even seem aware that other cars were on the floor. And was apparently willing to linger and visit.

Later, after we had cleared the lane, Johnny discussed some of his ideas on the function of a service salesman, while we rode in the lady-customer's new car.

"This customer complains about a squeak in the steering wheel," he commented, "but actually, the squeak is in the accelerator pedal.

"That's why it is important to drive the car and find out exactly what is wrong. Most customers come in and say they need this or that when in most cases they don't know.

"I could write tune-up orders every day, but I don't. They come in and order a tune-up. But in most cases the trouble can be mended with the turn of a screw-driver. Why should I sell a tune-up when I can send the customer on his way in just a few minutes? I know, I don't sell anything except a little personal attention. Yet I am not justified in writing a ticket on something I know I can fix in a minute.

"Other customers come in and want a steering-gear adjustment because of a shimmy. Actually, shimmy can also be caused by un-

When you use anything but the Best in Brake Fluid...



UNRETOUCHED PHOTOGRAPH

It's bound to happen when inferior brake fluid is used—swollen rubber and corroded metal that leads to brake failure in emergencies. • So ... Never use anything but the best in brake fluid. Use genuine Thermoid Hydraulic Brake Fluid. Meets or exceeds S.A. E. specifications.

Ihermoid

the standard of quality and precision processing in brake lining; brake blocks; hydraulic fluid, cylinder assemblies; hydraulic brake parts.



Thermoid Company . Trenton, New Jersey



Easy to Install

DELCO-REMY

DISTRIBUTOR RENEWAL PACKAGES





DELCO-REMY—A UNITED MOTORS LINE Available Everywhere Through UNITED MOTORS DISTRIBUTORS You can be sure of satisfactory performance and of satisfied customers when you service Delco-Remy distributors with these genuine Delco-Remy renewal breaker plates — now packaged for your convenience. They are easy to install without special tools and, because they are Delco-Remy built to original equipment specifications, they are bound to fit.

Delco-Remy packaged distributor renewal breaker plates fit scores of six- and eight-cylinder models, cars and trucks, both old and new. Order the popular assortment containing six packages — four breaker plates with contact points, condenser and molded bearings, assembled; two breaker plates with molded bearings only. Get your supply today — through your UNITED MOTORS DISTRIBUTORS.

Delco-Remy

Division, General motors corporation

Anderson, Indiana

WHEREVER WHEELS TURN OR PROPELLERS SPIN

balanced wheels, as everyone in the business knows, or even a universal joint. But most customers don't know what they need. It's my job to see that they get what they need."

When we were back on the service floor, Johnny indicated a roll of protruding felt, about the size of a pencil and an inch long. along the edge of a car's door

panel.

"You have to see that they get what they need and still you must be positive that the little appear-

ance and noise items about which customers are so particular, are taken care of. If, for illustration, the shop performs perfect service on all other items on this warranty ticket, and overlooks that little roll of felt, the customer's confidence is destroyed. He, or she, immediately reaches the conclusion that nothing else has been properly serviced. They may even suspect we haven't worked on the car at all.

"Yes, you have to get those little things. You can't remember

them all, so when a car is finished I take the ticket and check every item to be sure. In the afternoons, when I'm not busy, I go out through the shop and follow up some of my jobs out there. A good many customers phone in the afternoon to inquire how the job is coming. If I can give them exact information, that is personal attention they appreciate, too."

Johnny admits that, in the strict conception of the term, he is not so much a service salesman. For he actually tries to avoid selling a bill of service where he could.

easily enough.

Yet he does not believe a great many service salesmen can qualify as such. When they brush off the customers as rapidly as possible to get to the next car and 'make a nickel," they aren't selling service, either. They're selling repair orders, he says.

Johnny Grossman says he sells personal service, and that is true. Yet it is a brand of personal service well beyond the ordinary, brisk, let's - get - this - over - withquick attitude so common on serv-

ice floors.

What Johnny also sells is a profitable by-product of personal attention. He sells to a customer the idea that during their transaction, that customer is all-important to Johnny Grossman. does it by giving his undivided and unhurried attention to each customer in turn. And he definitely leaves the impression that each customer's car is the only car in which he has any interest whatsoever.

Willys Export Shipments Set Monthly Record

shipping schedule Willys-Overland Motors in August called for the export of more than 5,300 vehicles, the majority of them civilian Jeeps, Marcel F. DeMuller, president of the Willys-Overland Export Corp., announced.

August shipments were projected at 51 per cent above May, the year's highest month.

Automotive Ad Agency Opens

Formation of an advertising agency, Olney & Berrall, at 808 N. 3rd St., Milwaukee, Wis., has been announced by Richard C. Olney and Joe Berrall. The agency currently is handling five automotive accounts.





Here's a presold market for Rochester carburetors that grows bigger and bigger each month!

Want to do something about it? . . . want to tap this rich market? . . . want to get into the carburetor business the easy way, the quick way, the profitable way?

A small stock of Rochester carburetors and carburetor service parts, and you're on your way. Talk to your United Motors distributor.

ROCHESTER CARBURETORS ... A UNITED MOTORS LINE Available Everywhere Through

UNITED MOTORS DISTRIBUTORS







DIVISION OF GENERAL MOTORS, ROCHESTER, NEW YORK

ROCHESTER CARBURETOR SERVICE PARTS CABINET

Every service garage should have one. Assortment consists of 35 super-active service parts for Rochester carburetors. Entire deal sold at price of parts only . . . two gauges, cabinet and Service Manual are free. An easy way to get started in the carburetor service business.

Buick's XP-300 Engine

(Continued from page 89)

styling of the XP-300. The result is two cars driven by one of the most compact and powerful engines ever put into an automobile.

In the early stages of this program it became evident that Earl's styling for the Le Sabre left very little room for a conventional engine big enough to give it the desired power. Chayne accepted this as a challenge and set about de-

signing an engine that would give these cars a performance as startling as the proposed styling.

The major problem was putting the maximum amount of engine into the limited space reserved for it. For this Chayne adopted a 90-degree V-8 design and used supercharging to boost the power output to the desired amount.

The XP-300 engine is used in both cars. It is strictly for experimental purposes, designed and built with no thought given to production considerations. It

weighs only 550 pounds—nearly 250 pounds less than the engine in a Buick Roadmaster—yet its power output is more than double. Although it has been billed at 300 horsepower—thus the name XP-300—its output has been as much as 335 horsepower in dynamometer tests.

It has a bore and stroke of 3.25 inches, with a piston displacement of 215.7 cubic inches, compared with 320.2 cubic inches for the Roadmaster engine. It has a compression ratio of 10-to-1 and is supercharged to 18.2 pounds per square inch manifold pressure at 5.000 rpm.

One of the principal problems confronting the designer was that of keeping the over-all height of the engine down to a minimum. Both the XP-300 and Le Sabre are extremely low and the XP-300 has a hood which slopes toward the front, further limiting space.

Uses Shallow Oil Pan

Chayne overcame this problem by using a very shallow oil pan. a relatively small flywheel and by dividing the crankcase into two sections. The lower section carries the main bearings, water jackets and cylinder sleeves; the upper section contains the camshaft, valve lifters and intake manifold.

The crankcase is of cast aluminum alloy instead of cast iron. Use of aluminum resulted in considerable weight saving. Cylinder sleeves are of the "wet" type cast from "Ni-Resist" iron, which has a higher coefficient of expansion than the more commonly used alloys, and therefore more closely approaches the expansion rate of the aluminum cylinder head and pistons. The upper halves of the main bearings are fitted with steel inserts. The lower halves are forged steel.

To compensate for the low inertia of the small-diameter flywheel, Chayne substituted a bronze wheel for a steel one. The high tensile strength of bronze, together with its high specific gravity, makes this metal preferable for a flywheel in an engine operating at high speeds, and actually reduced the over-all height of the engine by 1.5 inches.

By nestling the upper section of the crankcase deep between the two banks of cylinders, enough clearance was obtained to install a "Roots"-type blower between the cylinder heads without



COMPLETE RADIATOR LINE FOR FALL-WINTER SERVICING



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JOHN T. STANLEY CO., INC. 642 West 30th Street, New York, N. Y.

MOBO MAKES DEPENDABLE PRODUCTS

Sell more lamps at change-over time

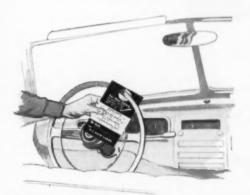
with this 2 minute, 20 second check-up!



1. Take 2 minutes to inspect all the lamps on each car left for Fall servicing. Headlamps, tail lamps, dash and trunk lamps. Actual tests prove that 1 car out of 3 needs at least one lamp replacement. And every G-E lamp sale means big profits for you!



2. Take 15 seconds to list the lamps your customer needs. Use the handy, General Electric "snap-on" memo card. There's room to recommend other items too... new tires, plugs, battery. (Get FREE "snap-on" cards and window banner from your G-Elamp supplier.)



3. Give yourself 5 seconds to attach the "snapon" memo card to the car's steering wheel. When your customer picks up his car, he's sure to see your sales message and be reminded to buy his needs from you. He'll appreciate this extra safety service.



4. Result: Every change-over creates lamp and TBA sales! The 2 minute, 20 second lamp check-up plus the G-E memo card is a sure-fire sales combination. So, for extra profits, get your free memo cards now. And order plenty of General Electric lamps. Call your supplier today.

Remember, G-E "All-Glass" Headlamps DO NOT GROW DIM!

GENERAL 👺 ELECTRIC

increasing the engine height. This location of the blower resulted in an intake manifold that is very short and contains a minimum of bends or obstructions, according to Buick.

The aluminum cylinder heads have fully-machined combustion chambers with intake and exhaust valves set opposite each other at 90 degrees, and with the spark plug at the top center of the chamber.

The engine was designed for high output at speeds considerably below those ordinarily attained in highly supercharged racing engines, and the valve sizes, ports and cams were carefully developed with this objective in mind. The position of the valves at 90 degrees to each other, together with the cylinder banks at 45 degrees to the horizontal, resulted in the intake valves being vertical. This made the ports a minimum length and contributed materially to the "free-flowing" characteristics of the intake manifold. Exhaust valves are sodium-

cooled and the guides for both the intake and exhaust were shrunk into the aluminum cylinder head. Because of the very high combustion chamber pressures, specially-designed laminated steel head gaskets are used.

Piston heads are domed to give the desired combustion chamber shape. The dome also adds materially to the structural strength

of the pistons.

A single camshaft, chain-driven from the front, is located between the two banks of cylinders. Valve lifters of the hydraulic, self-adjusting type operate the valves by push rods and rocker arms. Because of the shape of the combustion chamber and the angle of the cylinder banks, the intake valves are vertical and their rocker arms are mounted on one shaft on each head. Since the exhaust valves are horizontal, their push rods operate through drilled bosses in the cylinder block between the cylinders, and the rocker arms are carried on short, individuallymounted shafts. The valve mechanism is designed to operate without clatter or bounce at speeds up to 6,500 crankshaft rpm. Valve-rocker-arm covers and the spark-plug covers are aluminum alloy castings.

Belts Drive Supercharger

The supercharger is driven by three belts from a pulley located on the front of the crankshaft. Two aircraft-type pressure carburetors are used in place of the conventional float type. One supplies gasoline to the engine, the other methanol. The gasoline carburetor is used for all normal driving and gives satisfactory operation with present-day premium gasoline for engine operation below 125 horsepower. Methanol is required only for high outputs; consequently, the methanol carburetor comes into action only after the gasoline carburetor throttle reaches a nearly wideopen position. Two separate fuel tanks and electric fuel pumps supply the carburetors. Stainless steel exhaust manifolds of the collector type are used in this in-

The oil pan extends from the front of the engine to the rear of the housing, enclosing the flywheel. Since the flywheel extends below the oil level, a small dry sump is provided around the lower part of the wheel to prevent unnecessary churning of the oil.



Herbrand's tool-of-the-month DOOR HANDLE TOOL NO. BE-91

Herbrand's BF-91 Door Handle Tool makes it easy to drive out those hard-to-get-at handle retaining pins on inside car door and window lifts. Covers all makes of cars having this type of holding pin.

For current General Motors cars and late '51 Fords, the No.

BF-91 has a special hooked spring which releases the snap rings between the handle and handle flange.

Every mechanic will have need for the BF-91 when working on door locks, window lifts, window rails and glass replacement.

Mechanic's Net \$1.75



The No. BF-91 is Herbrand's current TOOL-OF-THE-MONTH selection. See it at your Herbrand distributor or write us.



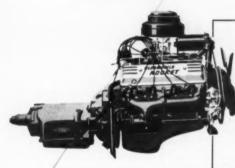
Herbrand Tools Fremont 8, Ohio THE BINGHAM-HERBRAND CORPORATION



HIGH-COMPRESSION BIRTHDAY!

Oldsmobile's "Rocket" was launched just three years ago!

"Rocket Anniversary!" Three years ago Oldsmobile introduced the most famous engine of modern times—the high-compression "Rocket"! Powerful proof of the success of the "Rocket" can be measured in sales! Over three-quarters of a million owners are now driving "Rocket" Engine cars , . . are now thrilling to the added performance, economy, and smoothness of this great engine! As the "Rocket" celebrates its third birthday, Oldsmobile dealers everywhere are celebrating the skyrocketing public enthusiasm for "Rocket" Engine Oldsmobiles. They all know that fit's smarter than ever to be with Olds!



Look at the record and see why so many are sold on the "Rocket"!

1948—Oldsmobile engineers unveil the first of the high-compression engines of the future—the "Rocket"! First "Rocket" Oldsmobiles are introduced to the public.

1949—"Rocket" Engine offered at a new low price in sensational new Oldsmobile "88"! "Rocket" Engine "88" is selected as official pace car for Indianapolis Memorial Day Race! 1950—Public enthusiasm for the "Rocket" continues to soar as Oldsmobile concentrates solely on "Rocket" Engines. Over halfa-million "Rocket" Oldsmobiles now on the road.

1951.—All-time great new Super "88" Oldsmobile introduced. Outstanding new improvements in the 1951 "Rocket" give Oldsmobile dealers the greatest sales story they've ever told.



Product of General A otars

"ROCKET" OLDSMOBILE

200-Ignition Spray

A waterproofing spray for ignition systems, marketed under the trade name "Shortstop," has been introduced by Zaco Laboratories, 1360 W. 9th St.,

Cleveland 13, Ohio.

The spray, said to be effective for several months after application, is available in 3-oz. and 12-oz. aerosol

Want more information? Use coupon on page 148 and you'll get it!

201-Thread Restorer

IS PRECISION INSTALLATION AND RVICE UNIT is so completely competent ERVICE UNIT is so completely competent, has required no change in 5 years. Heavy uty portable equipment also available.

SPECIAL 8 and 12 FLUTED

SPECIAL 8 and 12 FLUTED CUTTER makes only precision counter bore in replace-ment field.

A set of 8 sizes of thread restorers, ranging from a bolt diameter of 1/4" with 28 threads an inch to a 3/4" bolt



diameter with 16 threads an inch, has been added to the line of Bonney Forge & Tool Works, Allentown, Pa.

Identified as No. TR7, the set is said by the manufacturer to speed rechasing battered or damaged threads. Want more information? Use cou-

pon on page 148 and you'll get it!

CASH-IN NOW O

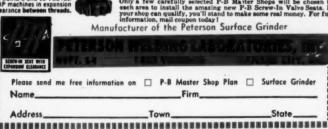


Valve Maintenance Plan That Wan I Come Out! DOUBLES VALVE MILEAGE!

Get ready now to handle the profitable rush to P-B Screw-In Valve Seats! Fleet owners are learning most valve trouble comes from faulty seats! After older truck engine looses factory clearances, corrodes and limes up, presedin seats now in common use fail to dissipate extra heat -buckle and distort. Trucks on heavy load assignments or fast runs require seats that take more heat. Self-locking P-B Screw-In Seats—with expansion clearance—eliminate the real cause of valve breakage and burning, give new-engine valve mileage. Easily reground or replaced in same threads-can't come loose, give perfect seating and heat dissipation.

A REAL PROFIT OPPORTUNITY!

Only a few carefully selected P-B Matter Shops will be chosen in such area to install the amazing new P-B Screw-In Valve Seats. If your shop can qualify, you'll stand to make some real money. For full information, mail coupon today!



202—Inspection Booklet

more

profits

An illustrated booklet on safety inspections, titled "Here's How to Get More Profits from

Your Safety Serv-ice Departments." has been issued by Weaver Manufac-turing Co., Springfield, Ill. Various models of

brake testers, wheel - alignment testers and headlight testers are featured. Statistics

on defects found in recent safety inspections and suggestions for selling safety service are also included. The booklet shows light-duty and heavyduty testers in both surface and flush

Want more information? Use cou-pon on page 148 and you'll get it!

203—Lighter-Dash Light

A combination cigar lighter and dash light, with the light built into the lighter knob, has been announced by Sinko Manufacturing & Tool Co., 3135 W. Grand Ave., Chicago 22, Ill. A tilt switch in the knob operates

the light. The unit is said to be inter-



changeable with standard equipment of most models now on the road. The both opaque and translucent.

Want more information? Use coupon on page 148 and you'll get it!

204—Diesel-Tool Guide

A 36-page guide on special tools for servicing diesel engines, including a section on heavy-duty repair-shop equipment for diesels, has been pubby Kent-Moore Organization, Inc., General Motors Bldg., Detroit 2, Mich. It contains descriptions, illustrations, applications and prices of more than 150 tools for GM diesels and related units.

Want more information? Use cou-pon on page 148 and you'll get it!

ONE-PIECE CELL COVERS

> DOUBLE INSULATION WOOD AND GLASS

HARD RUBBER CASE

"ONE-SHOT"
OXIDES

These Thor Features

mean EXTRA POWER ... EXTRA LIFE

The quality features built into every Thor Battery are your assurance that your customers will receive dependable battery performance.

Uniform Thor quality is maintained by constant laboratory control of every step in manufacture . . . plus rigid tests of performance . , . in one of the most modern battery laboratories in the industry.

This modern plant in Atlanta assures prompt service throughout the Southern territory.





PRICE
BATTERY CORPORATION

Hamburg, Pa.

Atlanta, Georgia • Boston (Medford) Mass.

205—Spring Compressor

A brake-pin spring compressor, said to save up to an hour on Chevrolet brake relining jobs, is now being marketed by Herbrand Division, The Bingham-Herbrand Corp., Fremont, Ohio. No. 188, as it is identified, removes

and replaces the special tension lock



washers used on Huck brakes on 1936-50 Chevrolets.

Want more information? Use cou-pon on page 148 and you'll get it!

206-Block-Repair Kit

A tool kit for block-repair services, including tools and materials for cracked motor blocks and other castings, has been announced by Versnick Manufac-turing Co., 4700 E. Nevada, Detroit 34, Mich.

Four sizes of taper plugs, made of motor block iron so they will expand and contract at the same rate as the block, are part of the kit. Other tools air hammer for trimming and peening, drill jig, reamer, facer, over-



size valve seats, ground taps and rotary files.

Want more information? Use cou-pon on page 148 and you'll get it!

207—Regulator Tester

A volt-amp-resistance regulator-generator tester, for use where 12- and 24-volt ranges are unnecessary, has been announced by King Electric Equipment Co., 9123 Inman Ave., Cleveland 5, Ohio.

The portable tester, identified as Model G-214, has a 5" D'Arsonval meter for fast, accurate readings. Tests can be made on an appropriate the control of th

can be made on an open or closed circuit in accordance with manufacturers' specifications. Self-contained load resistors substituted for vehicle battery give accurate regulator settings regardless of battery condition.

Want more information? Use cou-pon on page 148 and you'll get it!

208-Impact Wrench

A heavy-duty universal electric Impactool for nut-running jobs in truck, bus and industrial-maintenance fields has been added to the line of Inger-soll-Rand Co., Dept. F. P., 11 Broad-way, New York 4, N. Y. Size 34U, as it is identified, has a

1" square driver and is rated for bolts



up to 11/4". The electric motor and impact unit are placed side by side to reduce over-all height and permit hand-ling truck U-bolt nuts without jack-ing up truck. The tool can be reversed by an easy-to-grip switch. It weighs 321/2 lbs. and comes equipped with a heavy-duty plug and cable.

Want more information? Use cou-pon on page 148 and you'll get it!



You sell top performance when you sell Johnson Bearings. They are the result of 50 years' progress in sleeve bearings . . . highest quality possible. made to precise measurements, multiplechecked for dimensions, ready to install. You can readily recognize Johnson Con-Rod, Camshaft and Main Bearings by these attractive packages. Sell them in complete sets.



209-Spray Gun

A lightweight spray gun, using nozzer set-ups that are standard on most of its heavy-duty production spray guns, has been added to the line of Binks Manufacturing Co., 3114 Carroll Ave., Chicago 12, Ill.

The body of Model 29 is an aluminum casting that reduces weight of gun to



20 oz. It has a cartridge-type air valve, large air passages and a brass and ster material passage. It is recommended by the manufacturer for spraying lacquers, synthetic enamels and other coatings of light or medium viscosity.

Want more information? Use coupon on page 148 and you'll get it!

210—Trailer Stabilizer

The Wakeman stabilizer for tractortrailers, said to prevent jackknifing, has been placed on the market by The Truckstell Manufacturing Co., Union Commerce Bldg., Cleveland, Ohio.

Commerce Bldg., Cleveland, Ohio.
The unit provides an automatic hydraulic action that is said to prevent sudden changes in angle between tractor and trailer by limiting the speed at such changes. A foot control with which the driver can lock tractor and trailer into a rigid unit is another feature. Width of the stabilizer is 52" and weight is 160 lbs.

Want more information? Use coupon on page 148 and you'll get it!

211-Car Wash

A concentrated liquid car wash, packaged in collapsible tubes for extra convenience, has been announced by Swaco Products Corp., Hollis, N. Y. Called Won-Wash, the compound is said to be self-drying and non-streak-



ing. One tube contains enough for three wash jobs on passenger cars, a company announcement said.

Want more information? Use coupon on page 148 and you'll get it!



CUSTOMER SATISFACTION and Bigger Profits!

Only a clean car will take a high luster polish. BOWES Auto Polish removes dirt and road film, and gives a remarkably high polish with very little effort. Long noted as the polish that gives "more shine with less work," it is now improved—does the job even better.

BOWES Liquid Wax then keeps that polish gleaming for months... it laughs at rain. Together the polish and wax give your customers the kind of satisfaction that BRINGS 'EM BACK.

Products that are made right ... priced right ... merchandised right and ... nationally advertised ... will SELL. Display your BOWES Auto Polish and Liquid Wax—recommend them to your customers—and watch your profits go up. Sell 'em as a team, and you'll win friends and make more money. Remember ... this profitable team is nationally advertised.

Get Polish Profits . . . the Easy Way

BOWES

Display dependable Bowes Auto Polish and Liquid Wax...remember... products well displayed are more than half sold. Cash in on Bowes national advertising.

BOWES "SEAL FAST" CORPORATION
INDIANAPOLIS 7, INDIANA

212-Stop Light

No. 570 Stop-Lite, with a lens area of 6¼" and over-all diameter of 7¼", has been added to the line of Anthes Force Oiler Co., Fort Madison, Iowa. Two-inch letters stand out on a black background and choice of red or am-



Please send me additional information on the following New Products described in the September, 1951, issue of Southern AUTOMOTIVE JOURNAL:

No. No. No. No. Position Company Number and Street Postal Zone State

Tear out and mail to Sourman Automotive Journal, 806 Peachtree St., N.E., Atlanta 5, Ga.

has complete electronically contr battery chargers!

Fox Powerchargers bring a new, fool-proof simplicity to battery charging. Just connect Powercharger to battery, turn current on. That's all! No time clock to set, Powercharger does the rest. Perfect job, automatically, every

Safety Therment Control

. . . a Fox "exclusive" It detects and constantly reports battery condition to charger. If it is improperly used or accidentally removed, Powercharger cuts off automatically. Safety Therment, exclusive with Fox, has no moving parts, is virtually indestructible.



This model and other Fox Powerchargers are available with conventional electric timer control if desired.

Other features:

Compensated Cut-Off . . . Dynamic Comparator Battery Test . . . Automatic Trouble Light . . . Fast or Slow Charging . . . Full Year's Guarantee.

Wire or write Dept. F for full details

FOX PRODUCTS COMPANY

PRILADELPHIA KI, PA., U. X.

ber lens is available. The light uses a 6-8-volt, 21-candlepower, single-contact bulb. No. 570 has an L-shaped bracket for universal mounting, while No. 570-F is designed for flush mounting.

Want more information? Use cou-pon on this page and you'll get it!

213-Work Bench

An all-steel work bench with a lami-An all-steel work bench with a lami-nated, plastic-covered top, has been added to the line of Natkin & Co., 1601 S. Hanley Road, St. Louis 17, Mo. A heavy-steel bench top for the unit is also available. Bench is 60" long, 24" wide and 33%" high. It is fin-



ished in baked enamel and corners and legs are welded for added strength.

Top is said to be sturdy enough to
support vise, bench lathe or other shop equipment.

Want more information? Use coupon on this page and you'll get it!

214—Chrome Cleaner

A compound for cleaning chrome on automobiles and other vehicles has been placed on the market by Howard Smith and Co., 15310 Waterloo Road, Cleveland, Ohio.

Marketed under the trade name "Slik Trik," the cleaner is in powder form. It may be used with a wet cloth or mixed with a small quantity of water to form a paste, the manufacturer stated. It is said to dissolve rust and protect the finish in addition to cleaning the chrome.

The cleaner is packaged for the re-tail trade on display-merchandiser cards. Each card holds a dozen packages of the cleaner. A package con-tains more than enough cleaner to clean bright work on a passenger car, according to a company announcement.

Want more information? Use cou-

pon on this page and you'll get it!

215-Battery Kit

A battery service kit, molded of hard rubber and said to provide space for all facilities needed to check and service a storage battery, has been announced by The Electric Storage Battery Co.,



Allegheny Ave. & 19th St., Philadelphia 32, Pa.

It has a compartment for distilled water, extra-large tool compartment, space for an Exide Check-Charge and holders for hydrometer and syringe. It measures 11" long, 934" high and 634" wide. Weight is 6½ lbs.

Want more information? Use coupon on page 148 and you'll get it!

216-Windshield Washer

A windshield washer that operates by squeezing a plastic bottle has been

announced by Denton Hassell Manufacturing & Distributing Co., 20, Ferndale

Mich. The unit is said to fit cars, trucks and buses and be can installed with-

out drilling. It washes both right- and left-hand windshields at the same time, a com-pany announcement stated. It holds 6 oz. of water, said to be enough for 100 washes.

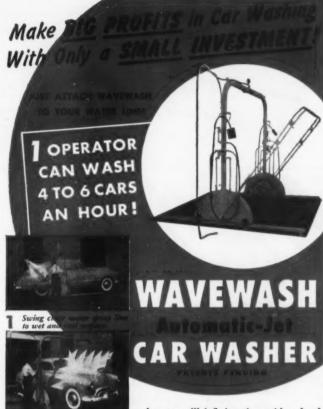
Want more information? Use coupon on page 148 and you'll get it!

217-Anti-Freeze

A funnel-top, cylindrical container for Whiz Zorbit gas-line anti-freeze has been introduced by R. M. Hollingshead Corp., 840 Cooper St., Camden 2, N. J.

The container fits directly into gastank opening, according to the manu-facturer. The compound absorbs waracturer. The compound absorbs wa-ter in both the gasoline and fuel sys-tem, dispersing it into fine particles that flow with the gasoline into the combustion chamber. This action is comoustion chamber. This section is said to minimize rusting and to help dissolve gum deposits that clog fuel lines and the carburetor. The com-pound is packaged in pint cans. A double-sided wire merchandising rack is available.

Want more information? Use coupon on page 148 and you'll get it!



Swing Wavewash Solution spray line over entire car.



3 Sponge rub surface of car.



Wave-rinse car. Dries without wiping-no streaks!

Are you still inflating tires with a hand

Is your car washing still being done by your "bucket brigade"?

Be modern! Be smart! With a Wavewash Car Washer, one operator can wash an entire car in only 10 or 15 minutes!

While your customers wait, you can wash cars quickly . . . thoroughly . . . profitably!

Wavewash car washing is smart merchandising. Offer your customers a complete service and you will

- · Pump more gas
- Multiply your grease jobs
 Make more oil changes
- Sell more accessories

No other car washer embodies all the distinctive features of Wavewash. Write today for free illustrated folder giving complete details.

Sales Representatives Coast to Coast

JOBBERS-a few choice territories still open. Write today!



219-Wiper Blades

Two replacement wiper blades, one for curved windshields and one for flat windshields, have been added to the line of Trico Products Corp., 817 Washington St., Buffalo 3, N. Y.

Both blades feature a flexible channel and free-floating rubber wiping



element. The blades are said to fit any make or model of car without adaptors. A counter-display package is available.

Want more information? Use coupon on page 148 and you'll get it!

220-Batteries

Four sizes in its Heavy-Duty DeLuxe battery line, Group 2, 2L, 2F and 2E, have been announced by Willard Storage Battery Co., 246 E. 131st St., Cleveland 1, Ohio. The batteries have increased cold-

The batteries have increased coldweather cranking power and resistance to under-hood temperatures. Hard rubber container is reinforced at points of stress. The Group 1 size was in-



troduced a year ago.

Want more information? Use coupon on page 148 and you'll get it!

221-Rubber Conditioner

A neutral-colored, odorless product that is said to restore color and luster to rubber materials without giving a glazed or painted finish has been placed on the market by Cecil H. Jarrett Co., Inc., Newton, N. C.

Kolor-Nu, as it is called, is recommended by the manufacturer for black tires, floor mats and similar applications. It is available in pints and gal-

Want more information? Use coupon on page 148 and you'll get it!

222-Portable Puller

A portable Hydra-Tote, designed to hold the complete OTC hydraulic pulling system and take pulling tools directly to the job, has been introduced by Owatonna Tool Co., 306 Cedar St., Owatonna. Minn.

Owatonna, Minn.
The unit is of sturdy, welded-steel construction. It measures 32" high, 36½" long and 16" wide at the base. There is a 10½" clearance between press uprights, 11" clearance from ram to top of press plate to floor. It has permanent steel hangers for basic items of the system and a tray for extra parts. Want more information? Use cou-

Want more information? Use coupon on page 148 and you'll get it!



NEW... and Better

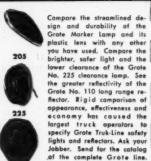
BRIGHTER WARNING FROM EVERY DIRECTION. MAKE EVERY TURN A GOOD TURN WITH



CLASS A—TYPE 1 DIRECTIONAL SIGNALS and SETS

These lamps have greatest attention compelling value in the busiest traffic — day or night.—They are brighter — an arresting warning that assures action! Rugged construction—designed and built for heavy-duty truck service. There's no better directional signal made than this Grote Truk-Line. Meets all SAE specifications, State and ICC requirements.

LINE 'EM UP . . . AND COMPARE VALUES





THE Grote MFG. CO., INC.

BILLEVUE KY.
(Opposite Cincinnoti)

0-110

223—Brake Lining

Green Block brake lining in the "U" combination has been added to the line of World Bestos, New Castle, Ind.

The lining is said by the manufacturer to stop brake squeal, eliminate fade, prevent heat-checked drums and keep drums free of organic films and other deposits caused by continuous high-temperature operation.

The combination includes one segment of Green Block with three "D" blocks. Lining is available in 3/4"

thickness.

Want more information? Use coupon on page 148 and you'll get it!

224—Hydraulic Pullers

Three popular sizes of OTC Grip-O-Matic pullers can be adapted to

be used with Twin hydraulic puller, it has been announced by Owatonna Tool Co., 306 Cedar St., Owatonna, Minn.

Only slight changes are necessary to change over to Nos. 1003L, 1003½ and 1003½-L to faster operating hydraulic power, a company announ-



The conversion incement stated. creases the range of utility as well as making the pullers more effective and efficient, the manufacturer stated.

Want more information? Use coupon on page 148 and you'll get it!

225—Relining Booklet

"How to Get More Stops between Relines," a booklet on its Silvertip brake lining for heavy-duty applica tions in trucks, passenger cars and taxis, has been issued by Engineering Division, Grizzly Manufacturing Co., Paulding, Ohio.

Want more information? Use coupon on page 148 and you'll get it!

226—Radiator Hose

A neoprene radiator hose for buses and trucks, said to give four times greater resistance to oil, grease and fumes than ordinary hose, has been announced by Thermoid Co., Trenton, N. J.

The hose has an inner tube of 3/32" average thickness compounded from neoprene. Reinforcement consists of woven fabric frictioned on both sides with a neoprene compound and plied on a 45° bias for flexibility. The out-er cover is 1/32" neoprene, adding to the heat-resisting qualities and protecting from oil and grease, the company reported.

The hose is available in standard sizes up to and including 1¾" inside diameter, two-ply, wall thickness 3/16". Over 1¾", there is three-ply construction and wall thickness of 15/64".

Want more information? Use coupon on page 148 and you'll get it!



Where BALANCE is needed!







"U" TYPE— A favorite in the industry. Fits ALL rims having factory trim rings except late model Cadillacs.

• "C" TYPE-The "C" type weight (new style) in six sizes will give most satisfactory results on passen-ger cars with "K" or "L" type rims

" type rims.

A "SPECIAL" TYPE. Made for late model Cadillacs with hub caps covering entire wheel, 1951 mode 1951 model for which "C" type weight is recom-mended, 6 sizes.

EQUIPMENT CORP. 804 W. Morgan St. KOKOMO, IND.

Manufacturers of Wheel Weights for Trucks and Passenger Cars

227—Fire Extinguisher

A liquid-type mechanical foam for extinguishing petroleum-product and polar-solvent fires has been announced by National Foam System, Inc., West

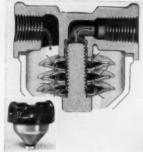
Chester, Pa.

Aer-O-Foam "99", as it is identified, can be used with existing devices for 6-per-cent mechanical foam making and proportioning. It is available in 5

Want more information? Use coupon on page 148 and you'll get it!

228—Gasoline Filter

A lightweight gasoline filter, featuring a non-woven rayon cloth to cover



For Best Results ... Must Be Good! All these ECHLIN Extras at no extra cost to you... MIRROR FINISH TUNGSTEN FREE FLOATING SPRING COPPER CONDUCTOR STRIP GREATER PRECISION CONTACTS COILS - CONDENSERS A OTHER AUTOMOTIVE

ECHLIN MANUFACTURING COMPANY . 228 EAST ST., NEW HAVEN 5, CONN.

ELECTRICAL PARTS

filter disc, has been placed on the market by Sparkler Manufacturing Co., Mundelein, Ill.

The filter is 21/4" high and 2" in dia-meter so it can be installed anywhere in fuel line, the manufacturer stated. It has a cast-aluminum top and aluminum-alloy bowl. Illustration shows exterior and cross-section views of the

Want more information? Use cou-pon on page 148 and you'll get it!

229-Lube Gun

A 10,000-lb., hand-operated grease gun, loaded either through a fitting or by removing cap from barrel, has been introduced by Aro Equipment Corp., Bryan, Ohio.

The gun holds 3 oz. of grease and weighs about 3 1/3 lbs. loaded. It has a spring-loaded barrel to give positive action and a relief valve to release back pressure after refill. It can be op-erated with one hand.

Want more information? Use coupon on page 148 and you'll get it!

230—Gas Guards

A line of gas-door guards for popular 1951 models and earlier cars has been announced by Richlite Manufac-



turing Co., 2326 Indiana Ave., Chicago 16, Ill

Made of No. 20-gauge steel and finished in triple-plate chrome, the guards can be installed without drilling.

Want more information? Use coupon on page 148 and you'll get it!

231-Clutch-Plate Grinder

A clutch-plate grinder with a vertical chuck, designed for those who precal chuck, designed for those who pre-fer this type grinder to its horizontal-chuck model, has been announced by Lempco Products, Inc., Bedford, Ohio. The grinder has a 25½ wing to mount large clutch plates and fly-

wheels. The turning and grinding are simultaneous with the tool and wheel moving across the face of the work. The unit has automatic hydraulic feed. Want more information? Use cou-

pon on page 148 and you'll get it!

232—Air-Brake Catalog

A 32-page, condensed catalog on its line of air-brake equipment has been issued by Bendix-Westinghouse Automotive Air Brake Co., Elyria, Ohio. Intended as an aid to vehicle owners and operators, the catalog is a guide in the selection of standard air-brake and accessory kits, popular service parts and

repair-exchange material.

Want more information? Use coupon on page 148 and you'll get it!



A. W. "Art" Schultz, above, resigned Sept. I as assistant to Executive Vice-President J. L. "Jack" Wiggins of National Standard Parts Association to become assistant sales manager of Auto Specialties Mfg. Co. He will be stationed at the firm's St. Joseph, Mich., head-quarters. Clayton Williams is the sales manager.

Jobber News

(Continued from page 83)

"Care Will Save Your Car" programs), will be the principal speaker at these meetings.

Vick paid tribute to George Rodesney, president of the Automotive Trades Association of Oklahoma City and owner of Auto Parts and Machine Co., for getting the program to rolling there. Most Oklahoma City jobbers are expected to participate, but the list had not been completed at press-time. Among the sponsors already lined up were:

S & S Automotive, Sharp Auto Supply, Boyington Auto Supply, Oklahoma City Hardware, H & H Auto Supply, A & B Spring, City Auto Parts, Capitol Hill Battery & Ignition, Allied Automotive Store, J & R Auto Supply, Capital City Auto Supply, Mac's Auto Supply, Oklahoma Clutch Supply, John's Bearing Machine & Supply, Auto Needs Co., Modern Bearing & Supply, Yow Brake & Clutch Supply, Broadway Machine & Motor Supply, Jobbers Crankshaft Service, Ray's Supply, Agnew Auto Parts, Van's Auto Supply and Auto Parts & Machine.

Sponsors of the St. Louis session, to be staged under the auspices of the Greater St. Louis Automotive Parts & Equipment Association, Inc., are:

Authorized Motor Parts, Automotive Engineering, Automotive Parts & Service, Auto Parts, Beck

& Corbitt, Borbein, Young & Co., Fred Campbell Auto Supply, Car Parts, Clayton Auto Parts, Fillmore Auto Electric Service, General Accessories & Supply, Gravois Auto Glass & Paint, Hampton Auto Supply, Dan F. Hyland, Inc., Kirn Auto Supply, Koochook Co., Maplewood Auto Supply, Medart Auto Electric, Missouri Auto Supply, Mound City Auto Parts, National Auto Supply, Natural Bridge Auto Parts, North Side Auto Parts, Oberjuerge Auto Parts, Progressive Automotive,

Reid Auto Parts, St. Louis Auto Parts, Sims Auto Glass, Southwest Auto Parts, Standard Auto Parts, Universal Parts & Service, Wagner Gear, Wellston Auto Parts and Wholesalers Service.

Door prizes, refreshments and entertainment are planned at both meetings.

Densite oil-filter cartridges have been taken on by Piedmont Auto Exchange, Charlotte, N. C., President George V. Gilbert announced last month.



Supersession of Numbers Has About Got Us Down!

By GUY J. BOND Cox Auto Parts, Paintsville, Ky.

It seems to me that many manufacturers are sabotaging their own sales programs in their endeavor to change the parts numbers on their merchandise at least once each time the moon changes.

The busy partsman has neither the time nor the patience to sift through a maze of supersession sheets in order to move merchandise bought and paid for.

It is uncalled for, unless the

Do You Agree?

Perhaps some manufacturers would like to voice some reasons for changing parts numbers often. Or maybe some other readers have comments on the subject. The editors will be glad to hear other opinions.

manufacturer hopes the purchasing agent, seeing a new and imposing parts number, will order a batch, only to find that he gets a duplicate in every way except in number of parts in which he already likely has a heavy inventory.

Not only is such supersession a headache, it is a sales loser as well—an ironic one too, inasmuch as merchandise camouflaged behind a silly new number can become a "forgotten part" within a very short time.

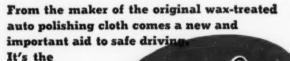
To illustrate clearly, here's how

The manufacturer will send out—not periodically, but usually every day—a supersession list to be followed shortly by new catalog pages. These new pages are substituted for the old ones in the catalog. The counterman gets a call for a certain part. The number in the new catalog is a complete stranger, an alien and an imposter!

If manufacturers would only get hep to the fact that countermen, salesmen and partsmen memorize parts numbers through association-usually the last three figures of the number! But, needless to say, it does little good to memorize and become intimately acquainted with a number that is subject to change with the regularity of a traffic signal. Unless every part in the establishment is changed to correspond to the new number (what a task!), the chances are ten to one that sales will be lost for a spell until the partsmen finally find an old catalog to resort to.

Naturally, for new-model cars and trucks new numbers in many instances are justified. But why, oh why, if that part is the same as on previous models, should the whole setup be changed and new numbers assigned to the same identical parts? Reminds one of a divorcee.

Sometime ago the "big shot"



Jas-stik



The market's wide open for this new wonder cloth that prevents Fog, Mist, Steam from forming on windshields and windows.

Just rub the Shoo-Fog Cloth over a slightly moistened glass surface. That's all it takes to prevent moisture from forming for TWO to TWENTY-FOUR HOURS (depending upon the temperature).

A quick-sale, big volume item, with a year-'round market, priced to sell at 39¢. One dozen cloths, each in a colorful glassine envelope, are attached six on each side of an attractive display card that takes only seven inches of counter space.



ORDER NOW-FROM YOUR JOBBER

GOOD BUSINESS FOR YOU, TOO, IN THESE FAST-SELLING LAS-STIK PRODUCTS











THE LAS-STIK MANUFACTURING CO., HAMILTON, OHIO, U.S.A.
DISTRICT REPRESENTATIVES: Southwest — Lynn & Hemphill,
301 North Market St., DALLAS, 2; Southeast — Wesley O.
Aaron, 843 Memorial Drive, S.E., ATLANTA; Kansas & Missouri
— E. G. Craft, 804 W. 48th St. KANSAS CITY 2.

or district sales manager for a well-known and widely-advertised line made a special call on us. Being somewhat enamored of his imposing title, he proceeded to complain that our stock was unbalanced, our catalog was not up to date, etc.

I offered to wager two bucks that his own 20-pound catalog was not even up to date. He couldn't believe his ears! Here was a mere cub questioning the integrity of a catalog just made up and sent him from the head office.

"It's a bet," he said.

"Okay," I replied. "Today is the 20th of the month. My wager is that, as of today, your catalog is not up to date. When you get your mail at the hotel tonight, there will be a supersession on something. My two bucks says so!"

Brother, he knew right off that I had him and he actually craw-fished on a two-buck wager. And well that he did too, for the very next mail brought a new supersession on some fuel-pump numbers!

Changes with Every Moon

I later asked this imposing gentleman if he could explain why his company had a penchant for changing parts numbers with each different phase of the moon.

From his hum and hawing I finally learned that his company was constantly improving its parts and when the engineering department improved something, it simply had to have a new parts number to work by. The old one was dry meat, a mackerel and a has-been. Nothing but a brandnew number could satisfy it. Claimed that it caused too much confusion in the process of improvement.

I made this suggestion, which I still think has merit; "When you improve or alter a part, why not so designate it with a suffix 'Imp.' or some other designation after the old parts number? In this way we partsmen can tell our customers that it has been improved."

But I was talking to a sales manager, not the "number changers," the top brass, so to speak, the Lord Plushbottoms who, when they get up in the morning with a hangover, insist on superseding something to appease their grouch!

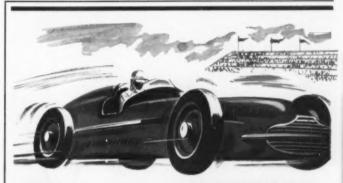
Some companies send out a

good hundred pounds of catalogs and extra pages through the run of a year! Most of this is to take care of changed parts numbers. And they expect the already harassed partsman to keep track of it all and be hep at all times.

Now on the other hand, we have many companies, (God bless 'em!) who fall in love with a parts number and nourish it along unchanged for years. And if they can use one number for one part for two or three decades, then reason teaches that others can too.

My suggestion is that if the engineering department requires a new number to work by, then let the big brass assign it a pet number, kept within company bounds and not tossed out into the trade to burden the partsmen and all the boys who actually sell the stuff—if they can identify it.

Lieut. Louis Robert Harding, formerly with Standard Auto Parts, Bristow, Okla.. who is now with the 45th in Japan, has been home on a 30-day leave.



Winners use MONMOUTH

MONMOUTH thin wall bearings are the choice of winners at the 500-mile Indianapolis Speedway Races.

In 1950, 8 of the first 10 cars to finish the race used Clevite 77 and Micro type Monmouth Engine Bearings.

In 1951, all 8 cars that finished the race used Clevite 77 and Micro type Monmouth Engine Bearings. The average speed of the winner was Monmouth Engine Bearings are designed and constructed, tailor-made if you please, for the work they have to do. This we call "Engineered Performance". It is just as important in your replacement work as in a Speedway race car. It is a quality found in no other engine bearing. You benefit your customers and safeguard your reputation when you insist on genuine Monmouth

insist on genuine Monmouth
Bearings. N. A. P. A.
Jobbers coast to coast
supply them. Ask for







All Monmouth Replacement Parts are engineered and precision made to safeguerd the reputation of the master automative mechanics and insure user safety and satisfaction.

THE CLEVELAND GRAPHITE BRONZE CO.

REPLACEMENT SALES DIVISION 6545 Cornegie Ava. • Claveland 3, Ohio

Joint Booth Conferences Recommended by ETI

A RESOLUTION recommending that individual conventions of MEMA, MEWA and NSPA be held in the same city and during the same week in any calendar year in which an ASI Show is not conducted, beginning with 1953, was adopted recently by the Equipment and Tool Institute.

It was also recommended that if a booth-type business conference is held in connection with the conventions, it be sponsored jointly by the three associations.

"Our membership believes that considerable benefit will accrue to both wholesalers and manufacturers if, beginning with the year 1953, the national associations will schedule their conventions for the same week and in the same city," said L. F. Woolman, executive manager of ETI.

The practice of scheduling individual conventions immediately before or during the ASI Show in show years has been of great benefit to membership of the associations, the resolution stated.

The expense entailed in occupying a conference booth adds to the over-all cost of convention attendance for those manufacturers who contract for booth space, it pointed out. This cost is multiplied by the number of conventions and/or booth conferences manufacturers are requested to attend.

It seems logical and advisable that benefits resulting from the cooperative effort between the three associations in the ASIS years should also be made available in other years, the resolution stated

If in any calendar year one or more business booth conferences is sponsored and conducted by less than all three of the national associations, ETI voted not to extend approval of it.

J. C. "Curry" Smyth Dies In Amarillo Hospital

C. "CURRY" Smyth, treasurer, buyer and founder of Smyth Auto Supply in Amarillo, Texas, died in a hospital there late in July a few days after an operation.

T. L. Ferguson is president of the company.

Martin-Senour Appoints Duchek

Don A. Seeley, manager of the Automotive Division of the Martin-Senour Co., announced last month the appointment of Michael J. "Mickey" Duchek as representative in the area served by the NAPA Columbus (Ohio) warehouse. Duchek will headquarter in Columbus and promote the sale of Martin-Senour automotive finishes with the 75 jobbers serviced by the warehouse throughout southern Ohio and West Virginia.

"Fishing has been bad. The terrific heat has had a bad effect even on the fish," Sam Suravitz, secretary-treasurer of Beard & Stone Electric Co., Inc., Houston, Texas, reported. "They are tempted with the finest bait but they continue to remain too damn lazy. It is the heat."

Twins, Cecile Elaine and George Arthur, III, were born to Mr. and Mrs. George Flowers, Jr. It's a safe bet that Grandfather G. A. Flowers, Sr., president of The Flowers Co. at Hickory, N. C., is strutting these days!



J. A. "Jack" Brand Added As NSPA Field Man

National Standard Parts Association has appointed J. A. "Jack" Brand as another field secretary, according to J. L. Wiggins, executive vice-president.

The new staff member is well known to many wholesalers and manufacturers in the field, having spent 20 years in the automotive service industry, 15 years of which were spent in the West and Southwest where he was formerly secretary of the B-3 Automotive Booster Club, Rocky Mountain District.

Brand started work in the automotive industry in 1931 with U.



Mr. Brand

S. L. Battery Corporation Division of Electric Auto-Lite Co. in Oklahoma City. In 1936 he was transferred to the Merchandising Division of Auto-Lite as district manager for the Rocky Mountain District. After eight years in this capacity, he was made assistant director of replacement sales for the Thermoid Co. in Trenton, N. J., and later was merchandising director for the Automotive Rubber Products Division. For the past year, he has been employed as merchandising manager for Gatke Corp., Chicago.

Jambor Opens at Houston

The second warehouse in recent months has been opened by the Jambor Tool Co., Milwaukee 10, Wis. This new unit, Warehouse Service Co., 1224 Leeland, Houston 3, Texas, will provide faster service for the jobbers in the eastern Texas territory. The other new warehouse branch is Warehousing & Distributing, Inc., at Atlanta. Ga.

Dayton Appoints Swain

H. H. "Bill" Swain has been appointed manager of automotive replacement sales for The Dayton Rubber Co. Swain has been in the rubber industry 22 years, specializing in automotive replacement parts.

Orsie Heads Champion Sales

Louis R. Orsie has been named general sales manager of Champion Laboratories, Inc., manufacturer of Champ oil filters and refills. He had been with New Britain Machine Co.'s Hand Tool Division for 13 years before joining Champion.

"We recently went fishing with a factory man who had a bad day, but yours truly caught two doubles—two bass on one cast—in a row," Manager G. A. Sanders of Central Auto Parts, Inc., Shreveport, La., reported. "The factory man was so enraged he threw a \$50 rig in the lake!"





This is the new store of Bridges Auto Parts Co., Rutherfordton, N. Co., a branch of Auto Parts Co., Forest City, N. C. Charles Higgins is manager of the store, which is owned and operated by D. C. Turner and Paul Bridges.

Beaumont Auto Parts Buys Aitken Auto Supply

BEAUMONT Auto Parts of Beaumont, Texas, announced last month the acquisition of Aitken Auto Supply of that city. The name will soon be changed to The Auto Supply Co., but the personnel will remain the same, according to T. G. McWhirter of Beaumont Auto Parts.

The latter firm has opened the Beaumont Auto Machine Co., located at Crockett and Orange

Streets in Beaumont.

'In opening this establishment, the automotive machine shop equipment of Ames Machinery Co., Texas Spring Co. and Torres & Co. was condensed with the original machine shop equipment of Beaumont Auto Parts," said Mc-Whirter. "Complete shop service is now rendered by this firm in its new location."

Hartis Joins Frank Brogan

Harold Hartis has joined the sales force of the Frank J. Brogan Co., Dallas, Texas, and will work in Oklahoma, western Arkansas and the Texas Panhandle, it is announced by Frank Brogan. Hartis was formerly connected with Wagner Electric Corp.

Cowie Dies at Kansas City

E. S. Cowie, founder of The E. S. Cowie Electric Co., Inc., Kansas City, Mo., died recently. He was well known to the automotive industry in his territory.

"We have added Columbus shock absorbers to our lines," F. L. Chamberlain, manager of the Automotive Division of C. D. Franke and Co., Charleston, S. C., reported last month.

"We will be adding Briggs-Stratton parts in September," Partner-Manager B. R. Clark of Clark Auto Parts Co., McAlester, Okla., reported last month.

The LOW COST With the

The Lisle HMI Wet Honing Machine handles practically all your wet honing jobs in the entire passenger car, light and medium truck field. Range .670" to 11/8" (range increased to 21/16" with HH-2 honing head)

Other Profitable Features:

Exclusive Rod Honing Clamp makes it easy to hone connecting rods perfectly, quickly.

Calibrated Honing Head lets you hone quickly to approximate size without constant checking.

> Put This Big Value Honing Machine to Work in Your Shop NOW!





JEEPERS CREEPER now sold exclusively by LISLE.



Are your thoughts beginning to turn toward the field, your gun and the taste of quail? Buddy Turner, shown here with two fine English setters, and his father, D. C. Turner of Auto Parts Co., Forest City, N. C., are all ready for the sesson. Friends say they really bring back the birds! We're ready to place our order, too.

W. R. "Bill" Nabb Returns To Mountjoy Company

R. "BILL" Nabb is back with the Mountjoy Co. at San Antonio, Texas, "and everyone is pleased to have 'Bill' in the capacity of store manager again," it was announced last month by C. H. Mountjoy.

Nabb was with the firm a number of years. "He has many friends in the automotive industry and everyone is pleased to see his smiling face here at the company again," Mountjoy said.

Edison Appoints Sheen

John R. Sheen has been appointed sales manager of the Automotive Division of Thomas A. Edison, Inc. He formerly was Southern district sales manager and more recently eastern regional sales manager. Sheen succeeds A. A. Manchester, named plant manager.

Markley Leaves Perfect Circle

J. L. "Les" Markley has resigned as assistant regional manager of Perfect Circle Corp. He had been assistant to John E. Colley, the veteran regional manager at Atlanta, Ga.

Shelby Galloway, city salesman for C. D. Franke and Co., Charleston, S. C., recently suffered a heart attack. Allan Burns, country salesman, has been in the hospital with an ulcer, F. L. Chamberlain, manager of the Automotive Division, reported.

Kester Solder



Easier to Use

the old reliable product now in a new package.

Mechanics know that using Kester makes any soldering job easier. Kester contains more grade A newly mined tin and only virgin lead, too. The fluxes are chemically and scientifically correct.

Faster

Kester is faster to use. Mechanics prefer it and are more satisfied when using it. The work is speeded up and output is increased.



The Mechanics Standard since 1899



Don't New Stick Your Neck Out! 'Mr. Giraffe's" long neck probably gets him into a lot of trouble. You can be positive you wouldn't be "sticking your neck out," when you put the Warco Quality Line of automotive chemicals to work in your shop. The Warco Laboratory Tested Line is backed by 15 years of satisfac tory performance to car, truck, and bus owners the world over. Ask your Jobber about the Warco Quality Line of automotive chemicals ARCO they'll enable you to render services in many branches of overhaul maintenance. YDRAULIC BRAKE FLUID VARCO WAREHOUSES Herman J. Downey Co. Birmingham, Ala. Parts Warehouse Co. Dollas, Tex. JACK Warehouse Service Co. Houston 3, Tex. Write for our catalog featuring the complete Warco Line M. L. Bud Cohn West Coast Rep: Los Angeles, California Sale Manufacturers of WARCO Grade "A" Products WARWICK LABORATORIES CO. 334-42 Cleveland Street, Brooklyn, N. Y. The De Cuxe

Members of National Standard Parts Association who can identify themselves in an enlargement of this photo of

? the organizational meeting, to be displayed at the executive management conference at

conference at the Sherman Hotel, Chicago, Oct. 29-31, will be given a print of the picture.

be given a print of the picture.

The original of the photo was presented to NSPA recently by R. E. Zerlin, New Orleans Auto Supply Co., Inc., New Orleans, La. Zerlin is a charter member of the association.

Federal-Regulation Service Included at NSPA Meeting

A SERVICE center where members may obtain specialized information regarding the application of federal regulations to their individual businesses will be a feature of the executive management conference of National Standard Parts Association, to be held Oct. 29-31 at the Sherman Hotel, Chicago.

Officials from Washington will be present during the entire conference to answer questions on government controls, regulations, orders and other problems.

Another feature that will make the meeting of more practical benefit is that afternoons will be free for wholesalers to have individual conferences with manufacturers at their suites in the Sherman.

Among the speakers scheduled are: C. C. "Chuck" Tapscott, McQuay-Norris Manufacturing Co.; Fred S. Roberts, Phelps-Roberts Corp., Washington, D. C.; Lowell Mason, commissioner, Federal Trade Commission; Les A. Thayer, Belden Manufacturing Co.; Don H. Teetor, Perfect Circle Corp.; James E. McCarthy, Notre Dame University; Russ Riley, Thompson Products, Inc.; Robert Heller, Robert Heller & Associates; Floyd E. Selim, Phillips Petroleum Corp.; J. L. Wiggins, executive vice-president, NSPA, and H. T. Halfpenny, legal coun-

All speakers' talks will be keyed as nearly as possible to the general convention themes of "government," "profit" and "markets," according to Tapscott, who is president of NSPA.

CHEMICAL

MEWA Junior Executives Hold "How To" Contest

THE Motor and Equipment Wholesalers Association is conducting a "How to Do It" essay contest for members of its Junior Executive Group. The essays may cover any phase of automotive wholesaling from a practical viewpoint.

Winners will be awarded bonds of \$100, \$50 and \$25, plus travel expenses to the convention, which will be held at the Stevens Hotel in Chicago Dec. 3-5. The winning essay will be presented to

the convention.

Gentz Heads Sparton Sales

E. W. Gentz has been appointed sales manager of the Sparton A u to motive Division of The Sparks-Withington Co., Jackson, Mich. He originally joined the company in 1931 and rejoined it in 1948, after working with Bohn Refrigerator Co. of Baltimore and Engineering Research Corp. of Washington, D. C.

Wagner Electric Buys Tract

Wagner Electric Corp. has bought a 52-acre tract in northwestern St. Louis near its main factory to build a plant for the manufacture and packaging of Wagner Lockheed hydraulic brake fluid. The plant will have about 63,000 square feet of floor space. Operation is expected to begin by the first of the year, officials of the company stated.

L. Duke Golden, below, has been appointed director of sales education of The Dayton Rubber Co., President A. L. Freedlander announced last month. For the last ten years Golden has been sales educational director for Perfect Circle Corp.



Extra Fall Change-over Service FOR FAT EXTRA PROFITS!



"KRYLON-ize"

ignition systems against winter wear and weather!

Krylon is a long-lasting, quick-hardening Acrylic spray. You clean ignition system, spray Krylon on wiring and parts—that's all!

"KRYLON-izing"

- Waterproofs and protects entire ignition system
- Assures quick, easy starts under all atmospheric conditions

 —all winter long
- Prevents battery-current leakage and spark plug shorting
- Prevents shorting at terminal points
- e Guards wiring, distributor head and ignition cell, starter and generator connections against corresion, acid, rust, ell, greeze and dir!

Profit Picture!

40c worth of Kryton plus less than % hour ther both cleaning and spraying) brings you \$2.95 to \$4.95. That's the kind of margin that makes people rich!

FREE SALES HELPS! Wall banners help sell the first job—ignition tags insure repeats regularly twice a year. If you're not using them already, BE SURE TO ASK YOUR JOBBER FOR THEM.

REGULAR "SATURDAY EVENING POST" ADVERTISING is preselling "Krylon-izing" in your town . . . to your customers! You'll find it easy to sell "Krylon-izing" as part of every fall change-over job!

"KRYLON-ize" bumpers, hub caps and grille to prevent rusting and pitting . . . to keep chrome new looking for years!

KRYLON, Inc. 2601 N. Broad St., Phila. 32, Pa.
Makers of famous WINDSHIELD SCALZIT

Majority of Inventories Are Up, Reports Show

Inventories of the great majority of jobbers were up ten to 20 per cent last month over the amount invested this past January 1. This was reported in answers to questionnaires sent 300 firms by Southern Automotive Journal.

As was to be expected, a num-

ber of respondents commented that they would like to have a larger stock of scarce merchandise and also that they were out of balance on some slow-moving stock.

A reduction of six per cent was reported from the January 1 figure by James C. "Jimmie" Park-

A Reader Survey

er, president of Motor Parts & Supply Co., Inc., Mobile, Ala., and president of Motor and Equipment Wholesalers Association. He added:

"However, our high inventory figure occurred March 31. We have reduced it ten per cent over that peak period and continue to reduce at about five-per-cent-permonth rate. In about 60 days we will be in excellent shape, provided we do not get another round of price increases in that interval

"Business volume continues good—43 per cent over first six months of last year."

Reporting an increased inventory (in terms of dollars invested) over the first of this year, Partner-Manager B. R. Clark of Clark Auto Parts Co., McAlester, Okla., said:

"We find volume of sales up with less items sold due to increase in prices, which means less turnover on stock. Collections not as good as 1949 due to high cost of living and increase in prices of all merchandise purchased."

Among other extended comments were:

President George V. Gilbert, Piedmont Auto Exchange, Charlotte, N. C.—"20 per cent more, but business is good. Just a very few scarce items."

Leonard P. Cain, sales and purchasing department, Automotive Super-Market, Inc. (successors to S m alley Automotive), Kansas City, Mo.—"Dollarwise inventory about the same as of January 1. Good movement on about 25 per cent of inventory. Slow turnover on 25 per cent. Fifty per cent of inventory very, very slow.

"That indicates our inventory investment is about 50 per cent more than it should be for a normal 'break-even' sales volume, which means that we will have to increase our sales and turnover of the items listed in the first 25 per cent bracket in order to be able to afford to carry the 50 per cent semi-dead stock or slow-moving numbers.

"Business (sales) June 15-Auguest 1 about 50 to 75 per cent off. due to rains and floods. (Most all jobbers in metropolitan areas report about the same reduction in sales.) Nice pick-up after August

....NIEHOFF

consumer campaign helps you serve transportation and the nation



C. E. NIEHOFF & CO. 4925 Lawrence Avenue • Chicago 30, III.

Ask your jobber how these two money sav-

ing sales tools can work for you! Or, write

for free booklet! Send today.

CERTIFIED DEALER
NIEHOFF
Wassanteed Ignition

BRANCHES: BOSTOM 34, Mass., 254 Brighton Ave. LOS ANGELES 15, Calif., 1330 W. Olympic Blvd NEW YORK 19, N. Y., 250 W. 54th St.

NIEHOFF Warranteed Ignition

1. We look for a good fall business."

President Grant Wagner, Kingsley-Wagner Supply Co., Hutchinson, Kan.—"Up 18 per cent. Better balanced than it has been in years."

C. H. Reilly, Link Motor Supply Co., Springfield, Mo.—"Up 40 per cent. Working to cut this down to at least 20 per cent."

at least 20 per cent."

Owner M. R. Walker, Sherman
Auto Parts Co., Sherman, Texas

"Down about 15 per cent. Fairly well balanced. Maybe five per
cent below normal."

Secretary-Treasurer Sam Suravitz, Beard & Stone Electric Co., Inc., Houston, Texas—"We would believe our inventory about ten per cent greater, although if we could get more fast-moving items our inventory would probably be much greater. Some days we think this is a healthy condition and on others our thinking is just the opposite.

"Price-cutting has become rampant by some concerns to try and beat the other fellow in reducing inventories."

"We're Scared to Death"

Manager G. A. Sanders. Central Auto Parts, Inc., Shreveport, La.—"Ten per cent down. We're scared to death to move upward, downward or sideways!"

Manager T. H. Coker, Gibbes Machinery Co., Columbia, S. C.—
"Our inventories of January 1 and August 1 were within a few dollars of each other, but on May 1 we were up 13 per cent. This may be a bad time to reduce inventory, but we feel that now is the time to balance inventory with sales."

Manager F. L. Chamberlain of Automotive Division, C. D. Franke and Co., Charleston, S. C. —"Up five per cent. Some jobers are giving equipment away—cost plus ten per cent, and even as low as five per cent."

Two Atlanta, Ga., jobbers gave an insight into their inventory problems.

One said he expected to do \$1,-500,000 volume this year—a record—yet he had \$20,000 less inventory than a few months ago, because he had been unable to get quantity deliveries of tie-rod ends and some other front-end parts. Where he used to get delivery on his orders for 400 or 500 units, he now has to accept two or three units of this merchandise, he said. "I'd like to have more money



stuff," was his observation.

On the other hand, the other Atlantan said:

What I need is a wall-spreader to house our stock. Because so many of our manufacturers have been expanding the number of their distributors, with the result that our sales volume in those lines has been cut, we have been forced to take on some additional lines in order to strive to keep our gross volume anywhere near what it was last year. Thus fan this

invested, but not in any wildcat year we're actually running 15 per cent below our sales volume last year."

Among reports received of higher inventory compared with the amount invested on January 1 (with the increase indicated in parentheses) were:

Tallahassee Auto Parts, Tallahassee, Fla. (up about 10 per cent); New Orleans Auto Supply. New Orleans, La. (up 13); Federal Auto Parts, Baltimore, Md. (22); Cooper Auto Stores, Sulphur. Okla. (20); Lewisburg Auto

Parts, Lewisburg, Tenn. (10); Automotive Parts Co., Monroe, La. (about 10): Auto Parts Co., Inc., Morgantown, W. Va. (20); Wiggins Auto Parts, Panama City, Fla. (15); Cabarrus Motor Supply, Kannapolis, N. C. (15).

Appalachian Auto Parts Co., Knoxville, Tenn., was among those reporting the inventories for the two dates as being about the

Among the decreases (indicated in parentheses) reported in the survey were:

Simmons Parts Co., Inc., Staunton, Va. (10 per cent less), and Motor Bearings & Supply Co., Dothan, Ala. (4).

In each of these three categories, there were replies which requested that the information not be published with identifying firm names.

Southwest Show Features "Parade of Progress"

SECOND theme, "Parade of Automotive Progress," will be featured at the tenth annual Southwest Automotive Show in the Sam Houston Coliseum. Houston, Texas, March 20-23, it has been announced by Dean A. Johnson, secretary-manager.

"A number of ancient automobiles and a few of recent vintage will dramatize the rapid advance of the automotive industry," Johnson said. "It will be suggested to exhibitors that they employ this theme as a means of dramatizing the evolution of their products and pointing out the succession of improvements which led to the quality item now on the market."

The general theme, "Get It from Your Jobber" and "Care Will Save Your Car," will also be featured.

Invitations have gone out to both exhibitors and sponsors, Johnson announced.

Lisle Names L. W. Bell For Southeastern Area

HE L. W. Bell Co. has been appointed representative for Lisle tools and Jeepers Creepers in four Southeastern states, it has been announced by the Lisle Corp.

George Gissing, former Lisle representative in the territory, has joined the Bell staff and will cover Georgia. Other salesmen will cover Florida and North and

South Carolina.



Rendering Dependable Service To The Automotive Industry Since 1922

Texas Wholesalers Set Meeting Sept. 28-30

THE time of the annual fall meeting of the Automotive Wholesalers of Texas has been changed from a tentative date in October to Sept. 29-30, it has been announced in a bulletin from J. B. Wilson, vice-president and chairman of the convention committee. The meeting will be at the Shamrock Hotel, Houston.

The program was not complete at the time the bulletin was sent out but plans included speeches by Jay Davis of Corpus Christi, association president; former State Senator Morris, who is expected to review the highway safety program, and representatives of MEWA and NSPA.

A panel discussion, featuring some of the outstanding figures in the industry in the Southwest, is another feature tentatively scheduled. Several inspirational and safety speakers are being contacted.

A "shamburger party" on the terrace on Friday evening for jobbers and their families and a stag party on Saturday evening, sponsored by B-30 and B-4, highlight the entertainment features.

Repairs Are Picking Up For Kentucky Firms

AJOR motor repairs and rebuilding are picking up," Walter J. Cook, owner of Cook Motor Parts Service, Louisville, Ky., reported last month when asked about conditions in his territory.

"I believe high prices and short terms are responsible," he commented. "I have cut out credit except to established businesses.

"Garages are shopping at wholesalers and machine shops for bargains. Some get inferior work by doing so."

Cook reported that he used pencils and telephone pads freely for advertising and found it a help to his business.

Auto Armature Merges With Exchange Parts

A UTO Armature Works of Waco, Texas, was merged with Exchange Parts Co., Fort Worth, last month, it has been announced by R. S. Bishop, manager of Exchange Parts.

Auto Armature Works will continue to operate under its present name and under the management of C. V. McDonald until the plant is moved to Fort Worth. At that time, McDonald will become associated with the management of Exchange Parts.

World Bestos Names Mathews

Appointment of Grady F. Mathews as World Bestos district manager of the Kansas, Nebraska and western Missouri district has been announced by W. F. Rogge, manager of World Bestos' Replacement Sales Division.

Tallahassee Adds Two Men

L. M. Jowers has been added as a territory salesman and W. P. Woodham, brother of Partner R. S. Woodham, is a new counter salesman, Tallahassee Auto Parts, Tallahassee, Fla., reported last month.

Asks Owner-Manager D. C. Turner of Auto Parts Co., Forest City, N. C.; "Are all fishermen liars or all liars fishermen?" A man's wife knows the answer!

LOST!

Big repair bills, Corrosion, Friction, Exposure of Metal Surfaces, Battery Drain, Gummy Deposits.

FOUND!

Longer Motor Life, Improved Lubrication, Protection of Engine Parts, Smoother Driving, Clean Motors, Added Miles

ask PYROIL

Pyroil is so easy to find and so economical to use. You'll find Pyroil at your nearest gas station. Add Pyroil — add miles to your ear.

PYROIL FOR AIRCRAFT ENGINES

Use Aircraft Pyroil B for lubricating oil, Aircraft Pyroil A for gasoline.

GIVEN!

An attractive Pyroil metal savings bank—takes coins up to 50c pieces. MOTORISTS, it's yours for the asking — sent postage paid.



PYROIL COMPANY

588 Main Street

La Crosse, Wisconsin

Canadian Distributors: Central Purchasing Agencies, Ltd. Toronto, Ontario

LOST!

By Mr. Jobber — a good dealer account just because he wasn't handling Pyroil.

FOUND!

By Mr. Jobber — a way to get the account back — plus big month after month and year after year profits.

he now PYROIL

— the "daddy" of all additives and the first choice of Dealers and Motorists!

Pyroil is today's most consistent seller with dealer accounts because it offers both jobbers and dealers an advertising program and merchandising plan that makes it a sure profit maker from the very start. The facts are yours for the asking.

DROP US A LINE AND WE'LL HAVE OUR FACTORY REPRESENTATIVE BRING YOU THE COMPLETE PYROIL MERCHANDISING AND PROMOTION PROGRAM.



REPRESENTATIVES:

Southeast—McDonald & McPherson Co., P. O. Box 452, Atlanta, Georgia Southcentral—John T. Jolly Sales Co., 1916 — 34th Ave., Meridian, Miss. Southwest—Hirsig-Frazier Co., 807 Cotton Exchange Bldg., Dallas, Texas West Coast—M. L. (Bud) Cohn, 1323 Venice Blvd., Los Angeles 6, California

News Briefs

(Continued from page 79)

"In many areas," he added, "the driver-training cars and qualified instructors are being utilized during the summer months, evenings and weekends in adult-driver-training programs, thus greatly expanding the use of the vehicle and offering an even greater opportunity for community participation and education."

Recent sampling studies in several states indicate driver education cuts accidents in half and reduces traffic violations even more.

Virginians Plan Breakfast During NADA Convention

THE Automotive Trade Association of Virginia will give a "Southern" breakfast at the Biltmore Hotel, New York, on Monday, January 27, during the convention of the National Automobile Dealers Association. All Virginia dealers and their wives are invited.

Tom Frost, Ford dealer of Warrenton, who is chairman of the Virginia NADA convention committee, predicted that more Virginians will attend the New York convention than any former NADA meeting.



Sept. 16-18—Annual convention of Kentucky Automobile Dealers Association, Kentucky Dam Village State Park, Gilbertsville.

Sept. 24-25—Annual convention of New Mexico Automotive Dealers Association, Murray Hotel, Silver City, N. M.

Sept. 27-29—Annual convention of Kansas Motor Car Dealers Association, Town House Hotel, Kansas City.

Sept. 28-29—Fall convention of Automotive Wholesalers of Texas, Shamrock Hotel, Hous-

Sept. 29-Oct. 1—Annual convention of South Carolina Automobile Dealers Association, Ocean

Forest Hotel, Myrtle Beach.
Sept. 30-Oct. 1-2—Annual convention of Automobile Dealers
Association of Alabama, Buena

Vista Hotel, Biloxi, Miss. Oct. 7-9—Annual convention of Mississippi Automobile Dealers Association, Buena Vista Hotel, Biloxi, Miss.

Oct. 14-16—Annual convention of Tennessee Automotive Association, Buena Vista Hotel, Biloxi.

Oct. 21-23—Annual convention of Florida Automobile Dealers Association, Tampa Terrace Hotel. Tampa.

Oct. 21-23—Annual convention of Georgia Automobile Dealers Association, General Oglethorpe Hotel, Savannah, Ga.

Oct. 29-31—Annual membership meeting of National Standard Parts Association, Sherman Hotel. Chicago.

Nov. 3-6—Annual convention of Texas Automotive Dealers Association, Shamrock Hotel, Houston.

Nov. 9-11—Annual convention of Automotive Parts Rebuilders Association, Stevens Hotel, Chicago. Ill.

Nov. 14-15—Annual convention of Oklahoma Automobile Dealers Association, Skirvin Hotel, Oklahoma City, Okla.

Nov. 19-21—Annual convention of Automotive Trade Association of Virginia, John Marshall Hotel, Richmond.

Nov. 27-29—Annual convention of National Used Car Dealers Association, Tampa Terrace Hotel, Tampa, Fla.

Dec. 5-7—Annual convention of Motor and Equipment Wholesalers Association, Stevens Hotel, Chicago, Ill.

Jan. 27-30—Annual convention of National Automobile Dealers Association, Waldorf - Astoria Hotel, New York City.

March 20-23—Southwest Automotive Show, Sam Houston Coliseum, Houston, Texas.

May 18-21—Annual convention of North C a r o l i n a Automobile Dealers Association, Carolina Hotel, Pinehurst, N. C.

Packard Promotes Kuhl

Thorn Kuhl has been promoted to public relations coordinator of Packard Motor Car Co. He succeeds S. J. Keith, who resigned to move to California. Before joining the firm in 1948, Kuhl was with the United Press and the Borger, Texas, Daily Herald.



SOUTH BEND 20. INDIANA

Export Sales: Bendix International Division, 72 Fifth Avenue, New York 11, N. Y.





This plant, containing more than 60,000 square feet of floor space for the manufacture of woven pa-per and woven Saran seat-cover per and woven Saran sensity at fabrics, was opened recently at Columbus, Ga., by Columbus Fiber Mills Co. Right-hand photo shows close-up of one of the looms in operation at the plant

Absorbent Agent Now Mined in Texas

WHEN mining operations in west Texas uncovered a strange substance a few years ago, a chemical analysis was necessary before operators knew they had an absorbent agent for quick removal of oil, grease, even water and almost any liquid.

This product is now being marketed, principally in the Southwest, under the name of Solvsal, and marketing facilities will be extended rapidly throughout the South and other regions, according to Jack Dalton, manufacturers' agent of Dallas, Texas, who is sole agent for the product.

Three men—Herbert Stubbs and J. E. Ausburn of Lubbock, Texas, and Tom Bullock, formerly of Lubbock and now of Lawton, Okla.-perceived possibilities of the mineral discovery and obtained a 99-year lease on the property. They formed a corporation and are doing business as the Caprock Chemical Co., Inc.

Dalton says the new product, containing eight per cent moisture, is quick in action and that it will absorb a large oil spot in one minute flat.

Warehouses have already been established in Beaumont, Texas; New Orleans, Shreveport, Monroe, Alexandria and Baton Rouge, La. Additional warehousing will soon be established in Texas, Oklahoma, Arkansas, New Mexico and Arizona.

(More News Briefs on page 170)

SELL YOUR CUSTOMERS RIGINAL PERFORMANCE



MATURES FACTORY METHOD REMANUFACTURED

BANDOM WOUND Greatest Load on Shortest Coils 1879002 Armature





- 14 Windings of Varying Length & Weight Improper Circulation of Air
- Wires Criss-Crossed, Shorts Out Quickly Not Wound to Original
- Specifications Lower Output and Short

Load Evenly Distributed 1879002 Armature

1161/4" More Wire Preformed Coils 14 Coils of Same Length

- 14 Coils of Same Length
 6 Weight
 Ample Ventilation & Air
 Circulation
 No Crossed Wires in Slots
 No Shorts—No Grounds
 —Longer Life

Today's automobiles de mand higher generator output. The manufacturers' answer is the Ventilated Matched Coil Armature. The VMC armature is built to meet original specifications of wire size, number of turns, and high efficiency. The VMC factory method of remanufacturing armatures insures uniform quality and precision produc-tion. The VMC armature is a guarantee of longer life and trouble free performance. Always specify VMC generator armatures.

NATIONWIDE



BUY THROUGH YOUR JOBBER

*Ventilated Matched Coils licensed by Carter Coil Company, Atlanta, Georgia

HELPFUL BOOKLETS FREE

182. FOUR-PURPORE AUTOMOTIVE CLEANER-13-page booklet on Oakite Fenetrant describes safe, economical way to (1) degrease engine parts, blocks, transmission and differential parts; (2) clean radiators and water jackets; (3) steam detergent method of cleaning chassis, motors, underparts; (4) clean floors, grease pits, areas sevound litts—all floors, grease pits, areas around litts—all Colatte Products, toge thening and Colatte Products, toge thening the products, toge thening the products, toge the products of the products

195. WAGNER AIR BRAKE AND ROTARY AIR COMPRESSOR BULLETIN. Discusses in detail straight air and air-overhydraulic air braking systems. Contains an explanation of the operations of the operation operation

168. ATTRACTIVE FOUR PAGE FOLD-ER showing specifications for several models of Oakite solution—lifting steam guns. Includes all purpose, beavy duty and with high pressure air or steam. Oakite Products, Inc., \$2 Thames Street, New York 6, N. Y.

109. AMMCO ENGINE REBULDING AND BRAKE SERVICE TOOLS AND EQUIPMENT Catalas secritions the unmooline of Wet and Dry Honing Machines. Brake Shoe Grinders, Brake Shoe Grinders, Brake Alignors, Line Boring Machines, Ridge Reamers, Portable Coolant Units, Tension Indicators, Tappet and Rocker Arm Grinders, Small Bore Hones, Cylinder Line, 2110 Commonwealth Avenue, North Chicago, Ill.

119. RAMCO SERVICE MANUAL—5th edition. Illustrated. Gives complete data on pistion ring installation—asia hints on locating engine trouble—causes of oil loss—pitfalls of motor-overhauling and how to overcome. Rameey Corp., 3898 Forest Park Blvd., St. Louis S. Mo.

122. INSTRUCTION BOOK and technical data on automotive wheel alignment frame straightening, and wheel balancing. Other books and pamphlets available on tire conservation methods and steering adjustments. Bear Manufacturing Company, Rock Island, Ill.

123. PERMATEX TOON-OYL is a scientifically developed product. It is a combination engine-carbon solvent, sludge preventative and film pressure-resistant. Its use produces smooth engine operation and gives protection against the formation of acid aludge and film breakdows. Permstex Co., 1720 Avenue Y. Brooklyn, N. Y.

134. McCORD RADIATOR-CORE CATA-LOG-Replacement radiator cores for popular ears, trucks and tractore are listed in ulphabetical order, along with a size that a with dimensions of McCord cores. It also lists enplete radiators for Fords and Chevroleta, Mc-Cord Corp., Riopelle at E. Grand Blvd., Detroit 11, Michigan.

125. STANDARD DUTY GENERATOR

REGULATORS — A 16-page 8½ x 11 inch booklet covering the operation and maintenance of Delco-Remy regulators. (62 pictures) Contains illustrations showing various steps of adjustment. Will belp automotive electricians understand and service regulators. Delco-Remy Service Department, Anderson, Indians.

127. HYDRAULIC BRAKE PLUID SERVIVE — HOW TO CHECK, DRAIN, PLUSH,
REFILL, BLEED — Easy reference book
that contains helpful service instructions as
well as detailed descriptions and illustrations
of the latest methods and procedures for
profitably servicing hydraulic braking systems.
Send for Bulletin HU-17, Wagner Electric
Corporation, 6563 Plymouth Avenue, St.
Louis 14, Missouri.

131. BURD HANDY HANDBOOK FOR MECHANICS—Information on piston ring installation; also "No Job for a Dub" for distribution by garages to their customers. Burd Piston Ring Co., Rockford, Ill.

133. CATALOG Ne. 508-R. Features more than 200 Champ-Item automotive replacement parts for all makes of care. A handy service book. Champ-Items, Inc., 6190 Maple Ave., St. Louis 14, Mo.

134. STREAMLINER CATALOGS on Moog Coll action front and parts, coil aprings, chassis parts and electrically heat-treated syrings for cars and trucks. Moog Industries, Inc., 6651 Easton Ave., St. Louis 14, Mo.

135. HYDRAULIC BRAKE SERVICE IN-STRUCTIONS AND MAINTENANCE HINTS—Explain fundamental principles of hydraulle brakes and their operation. Outlines correct procedures for brake inspection and adjustment. Gives cause and remedy for common brake troubles. Ask for HU-197. Wagner Electric Corporation, 6362 Plymouth Avenue, St. Louis 14, Missouri.

127. DELCO-REMY ELECTRICAL SERV-ICE—A 20-page 8½x11-inch bookist covering easential steps in servicing the electrical system on an automobile. Profusely illustrated (34 pictures.) A must for the automotive electrician. Delco-Remy Service Department, Anderson, Ind...

141. NEW PISTON RING CATALOG and full Power Story on Moog X-Plus Piston Rings for motor reconditioning. Moog Piston Ring Co., 6161 Easton Ave., St. Louis 14, Mo.

142. IGNITION — Catalog on Automotive ignition parks, wire and cable backed by customer satisfaction since 1921. Guaranteed by Andrews Mfg. Co., 924 S. Theresa Ave. St. Louis 3, Mo.

144. AUTOMOTIVE SERVICEMEN'S HANDY HAND BOOK — a simplified reference book for the operation, checking, tune-up and repair of auto, track, and tractor engines. Burd Piston Ring Company, Rockford, Ill.

149. NEW PAMPHLET DESCRIBING UNIT CONSTRUCTION OF Drive Shaft Bushing and Seal Assemblies, Housing Repair Kits, Repair Units, Transmission Case Ball Seats and Special Pinion Bearing Assembly for Chevrolet care, pick-ups and most GMC pickups. National Machine Works, P. O. Box

4805, Oklahoma City 9, Oklahoma.

180. NEW BLACKHAWK PORTO-POW-ER CATALOG NO. P.58, AND PRICE SCHEDULE — Includes "catalog of uses," covering Porto-Power service in repairing, rebuilding and reconditioning. Write Blackhawk Mfg. Co. Catalog Dept., P. O. Box 613, Milwaukee I. Wise.

181. WHIZ CATALOG NO. 48-C—Describes the complete line of Whis Automotive Chemicals designed to make cars run better and look better. R. M. Hollingshead Corp., 840 Copper St., Camden, New Jersey; Toronto, Canada.

162. WILLARD STORAGE BATTERY CATALOG—Complete technical specifications for storage batteries for every application. Liberally illustrated. the control of th

144. AIRTEX FUEL PUMPS AND ANTI-PULSATION GASOLINE FILTERS — New and Rebuilt Puel Pumps, Combination Fuel and Vacuum Pumps, Reyair Kits and Anti-Pulsation. Catalog AX64. Airtex Automotive Division, Inc., Fairfield, Ill.

172. WILLARD DRY BATTERIES—"A" and "B" Power Packs, "B" and "C" Fower Packs, "A" Batteries, "B" Batteries, "C" Batteries, "General Purpose Battery, Fortable Lantern Batteries, Radio Storage Batteries, Interchange Data. Willard Storage Battery Company, Cleveland 1, Ohio.

186. The LAMSON NO. 59-A AUTOMOTIVE CATALOG—A complete reference book on the most popular sises of cap servews, nuts, lock nuts, cotter pins, stove boits, lock washers, flat washers, expansion plugs, stude, starter boits and washers, ring gear, rivets, tractor boits, high nuts, U bolt rods, spring clip and apring center boits, battery bolts, license plate boits. List prices, weights, dimensions and package quantities are given. The Lamson & Sessions Co., 1917 W. 38th St. Cleveland 3, Ohio.

185. SERVICE MANUAL FOR THE DOCTOR OF MOTORS — A comprehensive and
thorough reference book which puts special
containing the service of the service of the containing of the service of

184. BATTERY SERVICE MANUAL—Prepared by Association of American Battery Manufacturers as an authentic reference and guide for everyone interested in automotive storage batteries. It is complete in its coverage of the subject and so simply written and so profusely flustrated that service men and car owners will find it easily understandable. Distributed by Auto-Lite Battery Corporation, P. O. Box 831, Toledo, Ohio.

193. WIRE & CABLE CATALOG—A 24 page catalog covering every automotive use of electric wire and cable, complete with specification data—Electric Auto-Lite Co., Merchandaing Division, Champlain & Chestnut St., Toledo J., Oklo.

195. CATALOG presenting the entire Yankee line of lamps, mirrors, and specialties in twelve pages. Each item is illustrated text given in condensed form. Classified for quick reference. Kalamasoo punched for filing. Catalog is page is devoted to a description of the various point of sale aids. Yankee Metal Froducts Corporation, Norwalk, Commercitous.

197. SPARK PLUGS — Condensed four page specification folder for passenger cars, including 1961 models. "Plug Chek" Indicator and Data Book also available. This service tool is designed to assist service mea in diagnosing spark plug beat range problems. The Electric Auto-Lite Co., Merchandising Division, Champlain & Chestnut Sta., Toledo I, Ohio.

208. POROUS CHROME PISTON RINGS

—A 4-page folder answering pertinent questions concerning Porous Chrome—the newest

1

development in piston rings. Koppers Company, Inc., Piston Ring Division, P. O. Box 626 Baltimore 3, Maryland.

284 AMERICAN HAMMENED PISTON RINGS-A five color descriptive catalog covering American Hammened Piston Rings and Koetheriaing. Included with current specificate. Koppers Company, Inc., Piston King Division, P. O. Box 636, Baltimore 8, Maryland.

225. 8-PAGE CONDENSED CATALOG—Showing complete line of K-D Tools. Over 130 tools described and illustrated. Ford Vaive Service Chart on the back shows correct K-D Tool combinations to service all Ford-built motors from 1928 to date. Free. K-D Manufacturing Co., Lancaster, Fa.

229. VALVE SERVICE MANUAL NO. 150 Explains Procedure of servicing valves in all Ford-built motors from 1932 thru 1950, Well illustrated. Write K. D. Manufacturing Co., Lancaster, Pa.

233. NEW 46-PAGE BLACKHAWK WRENCH CATALOG NO. W51-List socket, box-type and open end wrenches and sets, including new "Nuggett" double-duty drive socket wrenches. Blackhawk Mfg. Co., Milwauke 1, Wise.

249. CATALOG NO. 47-A AND SUPPLE-MENT describes car application data on generator and starter armatures and field colic. Contains valuable interchangeability data on all passenger cars through 1950 listing generator and starter armature applications for the popular trucks. Arrow Armatures Co., 18 Fordham Road, Beston 34, Mass.

258. CATALOG NO. 58-G describes our complete line of generator and starter motors. Complete ear application data is included in this booklet for all passenger cars and popular trucks through 1980. Arrow Armstras Co., 15 Fortham Road, Beston 84.

257. RUBBER PRODUCTS—A condensed catalog designed for parts reference work just released. It contains handy simplified identification and illustrations of floor mata, pedal pada, motor mounts, and robber bashings. Anchor Rubber Products Inc., 1725 London Road Cleveland 12, Ohio.

262. OIL FILTER MERCHANDISER—Those Extra Dollars and how to get them in oil filter service sales. All the facts on new Wix sales tools . . . the Cabinet Merchandiser and Wix Director. Wix Accessories Corp., Gastonia, N. C.

243. HAND TOOL CATALOG NO. 57M.—90 colorful pages of modern Hand Tools for all phases of automotive repair and maintenance, showing the right tool or tool set for practically every job. New Britain Machine Company, New Britain, Conn.

267. AUTOMOTIVE BEARINGS — Catalog 50-CB—a 68 page listing of connecting rods, cam shafts and main bearings for cars, trucks and tractor engines. Johnson Bronse Co., New Castle, Pa.

279. COOLING SYSTEMS, WHAT YOU SHOULD KNOW ABOUT THEM-15 pages, concisely written and clearly illustrated with diagrams and pictures. Tells you everything you need to know about the mechanics of cooling systems, helps build a better cooling systems, helps build a better cooling system service. Warner-Patterson Ca., 920 S. Michigan Ave., Chicago 8, III.

272. FREE CATALOG BULLETIN NO. 1999 describes Blackhawk's new "portable fitt", the J-17 LIFT-POST Hydraulic Jack Blackhawk Mfg. Co., Milwaukee 1, Wissonain.

277. ELECTRICAL SWITCHES—The 1951 Cole-Hersee line consists of automotive switches, truck and trailer connectors, accessories and miscellaneous automotive electrical equipment. Address Cole-Hersee Company, 28 Old Colony Avenue, Boston 27, Mass.

280. THE ABC'S OF SELLING SHOCK ABSORBERS - A 29 page, pocket-size "brase tacks" guide to shock absorber sales. Brief, humorously illustrated and down-to-earth, it gives full facts on shock inspection, selling techniques and important data on Briggs Shocks with patented piston and new O-Ring Seal. The Briggs Shock Absorber Company, Division of The Gabriel Company, Cleveland 3, Ohlo.

283. FACTS ABOUT IGNITION COILS— Learn what characteristics of a coil are needed for top motor performance, the significance of coil polarity, why an engine skips at low speeds and many other tips on ignition service. Schiln Mfg. Co., 242 East St., New Haven 5, Conn. 294. THE RICHLITE MFG. CO. has available for distribution a colorful and fully linutrated 28 page catalog of exhaust deflectors, rear view mirrors, inside door handles clothes hangers, gas door guards and many other quality automotive accessories and parts. Richlite Mfg. Co., 2326 Indiana Avenue, Chicago 18, Illinois.

367. VAL-VIN-HED — Attractive catalog aboat containing information about the new VAL-VIN-HED-SILE-NDER designed to perform three important functions in a motor with overhead valves and rocker arms. Silences valve elicking noise, provides overhead lubrication and protects against moisture condensation. Joe L. Estec Co., Winder, Gs.

399. OIL FILTER & MEFILL, RAPID REFERENCE CATALOG has easy-to-use Replacement Chart which alphabetically lists makes of cars and cross-indexes makes of filters for cars, trucks, buses and tractors. Glamp Multi-Screen and Standard Settle, and Company Multi-Screen and Standard Settle, and Company Company (Company Company). 122 Charles St., Meriden, Company Company (Company).

214 WAGNER BRAKE PARTS CATALOG

—A bandy ONE-POINT reference to fastmoving brake parts and lining, covering
popular models of cars and trucks. Catalog
also lists complete stock of sloce exchange
sets, as well as ColfaX bonded lining segments available to those interested in bonding lining in their own shops. Wagner Electric Corporation, 6362 Plymouth Avenue, St.
Louis 14, Missouri.

234. ATTRACTIVE POUR PAGE CATA-LOG FEATURING method of operation of the new Wavewash Automatic Jet Car Washer. Phillips Pump & Tank Co., 1432 State Avs. Cincinnati 4, Ohio.

327. SIGNAL-STAT CATALOG AND IN-STALLATION INSTRUCTIONS—describes and illustrates the Siglfare Switch and Flare Stat and complete line of Signal-Stat Directional Signal and Safety Equipment for passenger cars, trucks and busses. Signal-Stat Corp., 823-839 Kent Ave. Brooklyn, N. Y.

231. CELLO GRILLE GUARD catalog pages showing the many types available for both cars and trucks from 1946 to 1951 models. Cello Products Co., E. Boston 28, Mass.

232. CURVED WINDSHIELD INSTALLA-TION MANUAL — 32 page book explains removal and installation procedures for curved anfety plate windshields and tuf-flex Plate Glass backlights. Well illustrated. Libbey-Owens-Ford Glass Co. Dept. SAJ, Nicholas Bldg., Toledo 3, Ohio.

349. RADIATOR AND WATER CLEANER—catalog describing new radiator and water cleaner. Unit easy to install, priced economically, two models fit all cars, trucks and buses. Cartridge easily and quickly changed. Fram Corporation, Providence 18, R. I.

344. NEW BLACKHAWK JACK CATA-LOGUE Number J-50 and Price Schedule. Lists Hydraulic, Hand and Service Jacks from 1½ to 100 ton capacities and includes the J-17 "Lift-Port." Blackhawk Mfg. Co., Milwaukee I, Wisc.

345. HYDRAULIC BRAKE WALL CHART—Spiral bound listing up-to-date parts information for passenger cars and trucks, including listings for master and wheet cylinders, master and wheel cylinder repair kits, atop light switches and brake hoses. Eis Automotive Corp., Middletown, Conn.

346. PAY LOAD PROOF — Alcoa's new 36 page booklet on aluminum trailers. Performance records, weights, structural information. Write to Aluminum Co. of America, 670 (Dept. 8) Pittaburgh 19, Pa.

347. SHOCK ABSORBERS — A new shock absorber specification catalog, reduced to 8 pages, including complete sliphabetical and numerical listings on shock absorbers for all makes and models of cars. Available through Monroe Warehouse Distributors and Jobbers or by writing direct to the Monroe Auto Equipment Co., Monroe, Mich.

348. LIGHTING ACCESSORIES — Catalog sheets on auxiliary switch panels, toggle push and alide switches, truck and trailer switches, automotive electrical sockets, plus selling aids. Colc-Hersee Co., 24 Old Colony Ave., Boston 27, Mass.

351 PACKAGED SPRAY BOOTHS — 198 different packaged automotive spray booths designed to fit spraying requirements of all car and body shop dealers. Four-page specification brochure give somplete technical details. American Brake Shoe Company, Kellogg Div., 97 Humboldt St. Rochester 9, N. Y. 353. WILLARD CABLES AND ACCES-SORIES CATALOG. Illustrates and describe battery cables, ground straps, primary and secondary wire, terminals, hold downs, service tools and allied products. Replacement data. Technical information. Willard Storage Battery Co., Claveland 1, Ohio.

354. AIR COMPRESSOR CATALOG covers complete line of air compressors for automotive service industry together with selection sharis and data to insure selection of adequate compressor capacity. Westinghouse Air Brake Co., Industrial Products Div., Wilmerding, Pa.

355, TUBE AND TIRE REPAIR CATALOG in a handy 4° x 6° edition. Contains 32 pages. Each item fliustrated and fully described. Catalog is punched for hanging near telephone for easy reference. J. W. Speaker Corp., 3059 North Weil St., Milwaukee 12, Wisc.

358. G-E BAPETY LIGHTING SERVICE MANUAL — Tells how to sell automotive lighting service. How to aim headlamps. . What lamps to stock. Fully illustrated and packed with pleaty of "Know-how." Inquiry Bureau, Lamp Department, General Electric Co. Nela Park, Cleveland 12, Ohso.

364. AUTOMOTIVE SAPETY LIGHTING DEVICES — A new automotive catalog illustrating reflectors, directional signals, tail lights, step lights, armored clearance lamps and safety reflector flares—all heavy duty equipment, designed and built for commercial truck and bus use. Grote Mfg. Co., Bellevue, Ev.

345. PRONT END SUSPESSION — Parts, tie rods and king boit sets. Two new catalogs offering case and convenience in satabilahing part identification, description, manufacturer's number and quantity used per car. Front and service poster and direct mail post cards are being offered with oatslogs. Hersbey Metal Products, Ins., Derby, Conn.

369. LUBRICATION CATALOG—Complete line automotive lubricating equipment, including cabinets, guns, grease fittings, accessories, adapters, installation diagrams, installation instructions, technical data. Writs Aro Equipment Corporation, Bryan, Ohio.

\$72.—FAULTY BRAKES — Bad Breakes cause more accidents than any other mechanical defect. A free PEDAL BLOK is yours for the asking. American Brakeblok Div., 6616 Merritt Ave., Detroit 9, Michigan.

273.—NEW CATALOG ready for distribution. A new four page folder illustrating and describing new Model "B" Automatic One-End Lift. Automatic Steel Products, Inc. Canton, Ohio.

378. STRRAMLINED CLUTCH CATALOG NO. CP18A—providing complete liatings of ReNu-Accurate Clutch Sets. clutch plates, accessibles and other popular clutch items with vehicle part number interchange for twenty-eight most popular passenger cars, trucks and buses. Accurate Parts Mrg. Co., 12416 Euglid Ave., Cleveland 8, Ohio.

383. TIME SAVING, LABOR-AIDING IM-PACT TOOLS—Price list, complete details on electric Impactools, sockets & accessories, and thirteen common jobs where Impactool can save up to 30% of time required by hand wrenches. Ingersoll-Rand Company, 11 Broadway, New York 4, N. Y.

385. STEAM DETERGENT CLEANING— Fully illustrated folder in color, describing the time and cost saving of steam detergent cleaning in connection with industrial maintenance operations. Describes and defines the three simultaneous actions of steam detergent cleaning. Oakte Products, Inc. 22 Thams St., New York 6, N. Y.

388. FAST-SLOW BATTERY CHARGERS— An 8 page booklet describing a new era in implified battery charging together with features of new Fox Power Charger. Fox Products Co., 4720 N. 18th St. Philadelphia 41, Pa.

289. "FACTS OF LIFE—ENGINE LIFE"
16 page booklet on common engine troubles
and corrections, with emphasis on the nonmechanical tune-up. Illustrated throughout,
celling tips and instructions for use, Castle
Division, Haatings Manufacturing Co., Hastings, Michigan.

391. MOTOR CRACK REPAIR is fully described in Tincher Products Company's new 22 page manual. This manual contains specific repair routines for cracks in svery section of motor. Fully illustrated with diagrams and photographs, Tincher Products Co. Sycamore, Ill.

More News Briefs

(Continued from page 167)

Mississippi Convention To Repeat Clinic

A CLINIC, staged by dealers for dealers, will be a feature of the annual convention of Mississippi Automobile Dealers Association, Buena Vista Hotel, Biloxi, Oct. 7-9, Manager George Lemon Sugg announced last month.

Several hundred members are expected to attend. Tom Garrott, Jr., of Tunica is president of the association.

Alabamians Will Hear Kenneth McFarland

DR. KENNETH McFarland, consultant for General Motors Corp., and other nationally-known speakers will appear on the program of the annual convention of the Automobile Dealers Association of Alabama at Biloxi, Miss., Sept. 30-Oct. 2.

A forum on dealer problems will be another feature of the general sessions, it has been announced by W. M. Turner of Selma, chairman of the speakers committee. Mel B. Casler of Birmingham is chairman of the general convention committee.

Plymouth Starts Assembly Of Rescue-Plane Hulls

PLYMOUTH Division of Chrysler Corp. has started assembly operations on hulls for the Grumman Albatross amphibious airrescue plane at its Evansville, Ind., plant. While the section of the plant is still being prepared for volume output, portions of all major subassemblies are already in production.

About 700 production and office workers are currently employed on the airframe project and this number is expected to be doubled when volume output is reached, according to Plymouth officials.

R. J. Kingslev Dies

Richard J. "Dick" Kingsley, associate editor of the N.A.D.A. Magazine and radio-news editor of the National Automobile Dealers Association, died August 29 of a heart attack. He had also contributed many articles to the weekly NADA News-Letter.



Charles S. Brooking rounded up the gang, finally located a 1926 Dodge which he lined up alongside a '51 model and then called the photographer as part of his celebration this month of his 25th anniversary as a Dodge dealer at Gainesville, Fla. Brooking, shown between the cars, is one of the most highly regarded dealers in his state. He was president of the Florida Automobile Dealers Association in 1948-50, is a past president of the Gainesville association and has served three terms of three years each as a member of the Gainesville City Commission. He was mayor-commissioner for two years. He entered the industry in 1922 at Leesburg, Fla., as branch manager for I. W. Phillips & Sons of Orlando, Dodge distributors then.

Florida Speakers Include Stewart and McKay

W. Stewart, Chrysler-Plymouth dealer of St. Louis, Mo., and R. D. McKay, Wichita, Kan., president of the National Automobile Dealers Association, are two of the speakers scheduled for the convention of the Florida Automobile Dealers Association, to be held at Hotel Tampa Terrace Oct. 21-23.

N. C. Board Studies Gasoline Prices

The governor of North Carolina has appointed a 12-man committee to investigate the advisability of the regulation of gasoline prices by a state agency, such as the Utilities Commission.

Allan Mims of Rocky Mount, former president of the North Carolina Automobile Dealers Association, was selected to represent automobile dealers on the committee.

The committee will report its findings to the governor and make recommendations to the 1953 General AssemThe program will also feature James C. Moore, counsel for NADA; Dr. J. L. Brakefield of Birmingham, Ala.; Dr. Alfred P. Haake, consultant of General Motors, and William B. Buchanan, tax consultant of Washington, D. C., according to a bulletin from General Manager Walter C. Mallory.

Murbarger Heads Sales For Sealed Power

RICK E. Murbarger has been appointed general sales manager of Sealed Power Corp. He succeeds George W. Davies, who has been seriously ill.

Murbarger joined the firm in 1937. He was appointed assistant sales manager of the Replacement Division in 1944 and in 1949 he became director of distribution.

Nash Appoints Paxton

H. G. Paxton, formerly with General Motors Acceptance Corp. in Huntington and Charleston, W. Va., has been appointed national business management manager of Nash Motors Division.

Fruehauf Names Peterson

Kenneth R. Peterson has been appointed assistant to the president of Fruehauf Trailer Co.

Fiberglas for Separators May Add to Battery Life

A FIBERGLAS battery separator that is said to perform the functions of the separator and retainer mat in storage batteries has been announced by Owens-Corn-

ing Fiberglas Corp.

The initial cost of the separators probably will be higher than wood but lower than rubber, company officials said. Performance of the Fiberglas separators should be superior to that of wood and comparable to that of rubber, on the basis of tests conducted during the development period, they stated.

The separators reportedly can be installed in storage batteries in assembly-line operations in onehalf the time needed to install a separator and a retainer mat.

Batteries with the units are expected to be used in passenger cars wherever maximum performance is a consideration, such as in taxis, trucks and diesel-operated vehicles, as well as military vehicles and aircraft.



Fiberglas battery separators are said to perform the functions of both separators and retainer mats in automotive storage batteries.

The separators are not brittle and once inserted in the battery assembly will not warp or buckle, company engineers said. They are also resistant to underhood temperatures, high-gravity acid and overcharge.

Tests show that batteries with the separators have a higher fivesecond voltage, the engineers said, which means more power for cold starting.

The separators are made principally of inorganic materials that are practically unlimited in supply, the manufacturer said. Because they are manufactured in standard starting, lighting and ignition sizes, they are designed for use in any standard storage battery, it was stated.

McKay Will Address Kansas Convention

D. McKay, Chrysler-Plymouth dealer of Wichita, Kan., and president of the National Automobile Dealers Association, will be one of the principal speakers at the annual convention of the Kansas Motor Car Dealers Association at the Town House Hotel, Kansas City, Sept. 27-29.

Hotel, Kansas City, Sept. 27-29.
A panel discussion by representatives of three federal agencies and addresses by other well-known speakers will also be featured, Secretary-Manager Roscoe

Hambric announced.

1921 1951









DOUBLE QUALITY— TRIPLE VALUE

The Andrews line of Ignition Parts, Wire and Cables gives the trade:

Double Quality -- quality in material and workmanship.

Triple Value -- because

- 1. Complete line of quality merchandise
- 2. Fast turnover of packaged profits.
- 3. Guaranteed for customer satisfaction

Andrews Quality and value have been outstanding in the automotive replacement field for thirty years.





South Carolina Sessions To Fete Native Sons

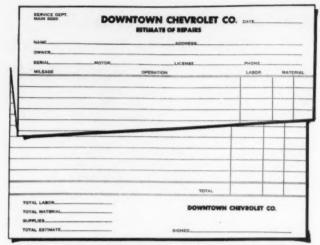
Sons of South Carolina who have attained prominence widely will be honored at the annual convention of the South Carolina Automobile Dealers Association at the Ocean Forest Hotel, Myrtle Beach, Sept. 29-Oct. 1.

Mrs. Ella W. Ford, executive secretary, announced also that the fifth automobile beauty pageant, one of the most popular features of this convention, would be staged again. Lovely girls are spon-sored by dealers of the various makes of cars and trucks, with a \$500 savings bond as the top prize.

Buick Allots Floor Space For Defense Production

Buick Motor Division has made available for defense work 1,200,000 square feet of floor space previously used for automotive production, Ivan L. Wiles, general manager, announced last month.

"Within a year we will have more than 4,000,000 square feet of floor space devoted to defense



Service Director W. R. "Bill" Humphlett of this Atlanta, Ga., dealership says this form's use in estimating repairs on body jobs has been invaluable. It has simplified the job and eliminated misunderstandings which might arise if advance, detailed data had not been given the customer, he said. Lead and sanding discs are listed in the "Supplies" column at lower left, while paint and replacement parts are carried in the "Material" column.

production," he said. Buick has a prime contract for and jet engines.

production of tank transmissions



entra profit—by installing Perfect Valve Packings on every valve and ring job. The graphite seal that is built into these packings makes it impossible for oil to pass through a worn intake valve

No Tools Necessary

VALVE PACKING

Ask your jobber or write us

Perfect Valve Packings were developed through years of laboratory and road testing. They are the largest selling valve packing on the market, endorsed by thousands of enthusiastic users. Southern Rep: Max Yaras 2911 Central Ave. Tampa, Fia.

DO NOT ACCEPT A SUBSTITUTE

PERFECT PARTS, INC. 55 Amsterdam Avenue, New York 23, N. Y

No. 510-TRACTOR LAMP Heavy s'amped bracket. Built for hard tractor service. 5" lens. 32 C.P. fixed focus beam.

No. 525-Sealed

beam. Ball mounting. 6" lens. Stainless steel door. Adjustable br'ket.

No. 425-F-Flush Mounting

Furnished in sets, four of either number or two each of &

both numbers with No. 441 manually operated switch

DIRECTIONAL SIGNALS for Class No. 425-H-Hinged Bracket

with enclosed flasher, or No. 434 self-cancelling switch at small extra cost. Sets are furnished complete with wiring diagram ready for installation.

No. 1248-FLUSH TYPE

CLEARANCE LAMP 4-1/16" overall diameter. Body diameter, 3 inches. Depth of body from flange, 11/2

inches. Body heavy gauge steel, face plate chrome plated. 3-inch semaphore lens. 3 cp. 6-8 volt bulb.

DO-RAY IRONSIDES No. 415 — Armored Clear-

ance Lamp. Heavy metal guard and additional center bar for lens protection. Silver-like lustre finish. Write for Complete Catalog



1458-64 S. MICHIGAN AVENUE DO-RAY LAMP CO. 1458-64 S. MICHIGAN AVERS

"White Brass" May Replace Nickel in Chrome Plating

DEVELOPMENT that may help replace strategically - short nickel in the automotive and other industries has been announced by the Du Pont Co.'s Electroche-

micals Department.

Through it, a "white brass" alloy is used to replace nickel as a base for chromium finish. This process is now the subject of intensive research work in the company's laboratories and in manufacturers' plants to adapt it to current production demands. The company emphasized that there are still a number of technical obstacles to be overcome.

In making bright, decorative metal parts, it is customary to plate chromium over deposits of copper or combinations of copper and nickel. However, in the current emergency, industry has been severely restricted in its use of nickel by government. The development promises to help alleviate this problem by providing an acceptable replacement for the scarce nickel.

Preliminary results indicate that chromium, plated over white brass, is indistinguishable in brightness and color from that plated on a nickel base. Du Pont engineers said. The white brass used in the process is an 80/20 zinc-copper alloy which is electrodeposited from a cyanide bath using special brightening agents. From there on articles are chromium plated in the usual manner.

All information on the development has been made available to industry, which it is understood is now conducting large-scale trials. the Du Pont announcement stat-

Willys Sales Are Higher

Sales of Willys-Overland Motors, Inc., for the first three quarters of its 1951 fiscal year were 117 per cent over the 1950 period.

Kentuckians to Feature Regulations Clinics

CLINIC on government regulations, featuring Pat Meloan, assistant regional director of the U.S. Department of Labor, Dr. John W. Manning, state director of OPS, and a representative of the Federal Reserve Bank, will be a highlight of the convention of the Kentucky Automobile Dealers Association at Kentucky Lake, Gilbertsville, Ky., Sept. 16-18.

Ben F. Long, the association's advisory committee chairman, will preside over the clinic.

"Cy" Williamson of Hopkinsville, Ky., will be the moderator of a clinic on state legislation.

J. B. Wagstaff, vice-president of the De Soto Division of Chrysler Corp., will be a principal speaker at the business session on the final day of the meeting.

Karl M. Richards, manager of the field services of the Automobile Manufacturers Association. will be one of the principal speak-

James C. Moore, general counsel for the national dealers association, will speak also.

AT LAST...

A Shock Absorber that Sells Itself!

You don't have to use high pressure tactics to sell

One demonstration convinces the skeptic. He, in turn, sells his friends and starts a chain reaction. Everyone benefits, including you, the dealer. The Columbus Luxury-ride Shock Absorber is the only completely different shock absorber now on sale. It has 17 superior features.

Tests prove that it will out-perform and outlast competitive types on today's market. Heavy duty throughout, it is priced competitively with conventional shock absorbers.

Don't delay. See your jobber today. "The Shock Absorber that Outsmarts



MANUFACTURED BY HECKETHORN MFG. & SUPPLY CO., LITTLETON, COLORADO

Motor-Vehicle Taxes Hit \$5,000,000,000

More than \$5,000,000,000 in taxes was paid last year by highway users in connection with their ownership and operation of motor vehicles alone, according to an estimate by the National Highway Users Conference.

Nearly \$3,000,000,000 was accounted for in special imposts for highway purposes — principally state motor-fuel, registration and carrier taxes. These levies showed a rise of more than \$300,000,000 over the previous year, the organization reported.

An incomplete tally of taxes paid by road users to the general support of the government accounted for \$2,175,275,000. The largest item in this category was federal automotive excise taxes.

General sales taxes on automotive products totaled \$358,229,000 and personal-property taxes paid on motor vehicles were estimated at \$130.000.000.

These general taxes to all levels of government do not include income or social-security taxes, nor taxes paid by the automobile, tire and petroleum industries.

Wet Ream or Hone with LEMPCO Speedmaster



Originally designed and widely used as a precision hone, the Speedmaster ReamoRhone now serves as a drive for both wet reamer and hone. One machine instead of two, with hone. The work runs coaler, cleared and hone. The work runs coaler, cleared and hone. The work runs coaler, cleared the simply turn the micrometer dial. Ideal for speed and accuracy in fitting pins, master cylinders, king boths and sterning sectors. For details write Lempco Products, Inc., 5490 Dunhom Rd., Bedford, Ohie.

LEMPCO Invest in
LEMPCO EQUIPMENT
... It pays its own way



Andress Motor Co., Inc., Ford dealership at Shreveport, La., used this newspaper ad to pay tribute to its competitor, Wray-Dickinson Co., on its 40th anniversary. Wray-Dickinson is said to be the oldest Ford dealership in Louisiana, having opened in August, 1911.

Car Dealers Greatly Favor Continuing Sales Contract

 $D_{\mathrm{vor:}}^{\mathtt{EALERS}}$ overwhelmingly fa-

A continuing selling agreement with their factories rather than one requiring renewal annually;

Excluding from the agreement a clause permitting cancellation without cause or at will;

Including a clause in this agreement to provide that in the event of the death of a dealer, his heirs or estate should have a reasonable opportunity to prove their ability to carry on the business satisfactorily, and in the event of the necessity of a sale or liquidation of the business of a deceased dealer, these proceedings be taken on the basis that the business is a going concern.

That was revealed in replies last month from 12,421 of the

more than 33,000 members of the National Automobile Dealers Association to a questionnaire designed to guide the work of NADA's industry relations committee on dealer-factory relations.

For the continuing agreement, the vote was 11,303 (91 per cent) to 1,118 (9 per cent).

For excluding the withoutcause clause, the tabulation was 10,459 (84.2 per cent) to 1,962 (15.8 per cent).

On the final question, the vote was 12,211 (98.3 per cent) to 210 (1.7 per cent).

Ford Motor Co.'s pressed-steel plant for automotive body parts at Dearborn, Mich., is said to be the largest single metal-stamping operation in the entire world. Heading up the West Virginia Automobile Dealers Association for the coming year are (l. to r.): Carlton E. Welch, general manager; Richard D. Chittum, Parkersburg, treasurer; President A. D. Wolfe, Fairmont; Walter M. Dunean, Beckley, past president, and Andrew Williams, Bluefield, first vice-president. Regional vice-presidents not shown are: William Barrick, Clarksburg, northern region; J. D. Bullington, Spencer, central region, and George Carroll, North Fork, southern region.

Record Attendance Marks West Virginia Meeting

THE largest group ever to attend a convention of the West Virginia Automobile Dealers Association, about 425, met at The Greenbrier, White Sulphur Springs, August 26-28.

R. D. McKay, Wichita, Kan., president of the National Automobile Dealers Association, was the principal speaker at the opening business session. He discussed some of the problems that confront dealers in these days of inflation and mounting taxes.

A forum on state motor-vehicle laws, moderated by Cecil Walker of Rhodes-Walker Chevrolet Co., was a highlight of the second day's session. Participating in the forum were Don McClaugherty, commissioner of the Motor Vehicle Department; Ralph Ballard, assistant commissioner; Col. W. E. Burchett, superintendent of the Department of Public Safety; Don Schaffer, member of the State Road Commission Planning Board, and Larry Rollins, Valley Motor Sales, Charleston.

Col. Jack Major of Paducah, Ky., well-known humorist, was another featured speaker.

another featured speaker.

A "dude ranch" party, cocktail party and dance highlighted the entertainment program.

A full program was also arranged for ladies attending the meeting. It included a golf tournament and a lecture on flower arrangements.

Ford Workers Get Awards

Nearly 15,000 employees of Ford Motor Co. have shared in cash awards since 1947 for suggesting ways to improve their own jobs, company officials announced recently. The average award has been \$53.60, with 62 employees receiving maximum awards of \$1,500 each.



Ha Dees Fresk-Aire



SELL FREE HEAT WITH HaDees

controls any desired temperature.

Everything you need for large volume profits is yours with HaDees. You get FRESH-AIRE Models Custom Built for 1949-50-51 popular care—complete units that slip into place with no cutting or drilling—no extra parts to buy. You get a full line of Re-circulating heaters to meet every price and purpose—an Under-Seat Model that fits 95% of cars on the road—plus famous HaDees Truck and Bus Models for heavy-duty service. HaDees Thermostats, Defrosters, Safety Fans, Heater Hose, and Genuine Service Parts round out the line. Better see your HaDees Jobber and place your order now!

... AND DON'T FORGET THESE IMPORTANT LITTLE PROFIT MAKERS

Neart of a HaDees Thermostar is the Sylphon Bellows. Fermed from a single piece of metal with no seams . ne soldered joints . . it's the perfect diaphragm for automotive



WRITE FOR THE NEW Hadees CATALOG

BURD PISTON RING COMPANY

90 Per Cent of Automobiles Used for Work or Shopping

N INE out of ten passenger cars in the United States are used each week in earning a living, shopping or both, it was pointed out in the 1951 edition of Automobile Facts and Figures, annual statistical handbook issued by the Automobile Manufacturers Association.

Among the highlights of a comprehensive survey of passengercar use in America, made early

this year, were:

1.—During an average week, 73 per cent of the nation's private automobiles are used for traveling to and from jobs, conducting business or doing work on the farm.

2.—About 22,000,000 passenger cars are used each week for earning a living; 16,000,000 for shopping.

3.—Some 27,500,000 persons in the United States use passenger cars daily in earning a living.

4.—Forty-five per cent of all employed persons use a passenger

car in connection with their work.

The yearbook pointed out that several automotive records were set during 1950—in passenger-car output, over-all motor-vehicle registrations, gasoline consumption, vehicle mileage driven and in special taxes paid by motor-vehicle users.

Total vehicle production for the year was 8,003,045 units, including 6,665,863 passenger cars and 1,337,182 trucks and buses. This brought the 51-year production of the industry to 116,000,000 ve-

hicles.

The United States accounted for about 76 per cent of world motor-vehicle output for the year, which was estimated at 10,577,426 units.

In spite of the high rate of 1950 production, 55 per cent of the cars in use during the year were prewar models, the average age being nearly eight years. Average age in 1941 was 5½ years. Average truck age in 1950 was seven years, an increase of 1½ years since 1941.

The life of motor vehicles has more than doubled in 25 years. Scrapped cars today average 14 years, compared with the 1925 average of 6½ years. Average life-time mileage has increased from 25,750 to 120,500.

U. S. motor-vehicle registrations in 1950 reached 49,176,796. World motor-vehicle registrations in 1950 totaled 70,400,000.

Employment, hours worked and earnings in the automotive industry reached an all-time high in 1950. Average weekly earnings of production workers were \$73.25 and weekly hours averaged 41.2. This compared with \$65.97 and 38.9 in 1949. Total employment during the year was 839,400, compared with 769,000 in 1949.

Turrentine Heads Dealers

"Ed" Turrentine of Turrentine Chevrolet, Las Cruces, N. M., has been elected president of the recently-organized Dona Ana County Automotive Dealers Association.

Packard Promotes Johnson

Harold N. Johnson, formerly parts and service manager for the



A. E. Greene, Sr., vice-president and director of transportation of The Mason and Dixon Lines, Inc., Atlanta, Ga., receives a plaque from Robert F. Coleman of The Electric Auto-Lite Co. for the outstanding safety record set by his firm for carriers traveling more than 12,000,000 miles annually. The award was given by Auto-Lite and the American Trucking Associations to encourage safety on the highways and streets throughout the United States.

Atlanta zone of Packard Motor Car Co., has been promoted to western divisional parts and service manager. A native of Kansas City, Mo., he attended the University of Kansas City and was with Pratt & Whitney before joining Packard.

VENCO tailgate loader can help you



can help your sales

VENCO PUTS THE "PICKUP" IN YOUR PICKUP TRUCK AT HALF-THE COST OF COMPARABLE LOADING EQUIPMENT

Cut labor costs in your own shop or add profits to that next truck sale with VENCO. Prevents injury to personnel or merchandise. 600 lb. capacity. Order VENCO today!

For FREE literature and name of nearest truck equipment dealer write:

THE VEN CORPORATION

2832 Newell St., Dept. S9 Los Angeles 39, Calif.



Winners in Fisher Body Craftsman's Guild model-ear contest included: Webster S. Benner, Jr., Lakeland, Fla., second award in the senior division; Edward F. Taylor, Oklahoma City, Okla, third award in the senior division, and Leonard C. Bellanca, Wilmington, Del., second award in the senior division went to Paul H. Richardson, Red Wing, Minn., and in the junior division to Gordon D. Williams, Los Angeles, Calif. The winners are shown with Charles F. Kettering, Charles E. Wilson and other General Motors officials.



New Regulation Covers Refrigerated Units

A METHOD of determining ceiling prices on used automobiles equipped with a refrigerated air-conditioning unit and on used automobiles with a special body or engine has been announced by the OPS.

Sellers may add to used-car ceiling price the price of the refrigerated air-conditioning unit as determined under the general ceiling price regulation.

In the case of a used car which has been substantially modified by the addition of a special body or engine, the amendment provides that the ceiling price is determined under the general ceiling price regulation rather than by supplementary regulation 5.

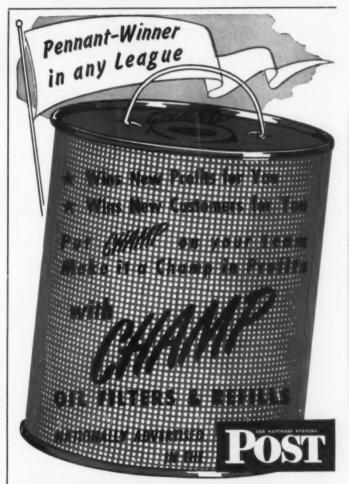
Personnel Armored Car Goes into Production

PRODUCTION of a new armored personnel carrier that will take infantrymen to the front lines along with tanks while giving protection from small-arms fire and shell fragments has been announced by the Department of the Army. The vehicle's armament is a .50 caliber machine gun.

The car is being produced by International Harvester Co. of Chicago and the Food Machinery and Chemical Corp. of San Jose, Calif. It is said to have higher speed and increased maneuverability.

Soss Heads Hinge Firm

Samuel Soss, former vice-president (sales) and also the secretary, has been named president of Soss Manufacturing Co., one of the largest manufacturers of hinges for automobiles, furniture and general building purposes.



CHAMPION LABORATORIES INC., MERIDEN, CONN., U. S. A.

ORDER FROM JOBBER

DeVilbiss Co. Produces Reconditioning Film

showing market and profit opportunities existing in the appearance-reconditioning of automobiles, has been produced by The DeVilbiss Co., Toledo, Ohio.

The 16-mm sound film, in color,

The 16-mm sound film, in color, runs about 25 minutes. The scenes are laid in the office and paint shop of an automobile dealer. The film contains information on training of spray operators, necessary equipment for the paint shop and merchandising helps.

It is available through the regional sales offices and distributors of The DeVilbiss Co.

OPS Grants Usual Markups On Automotive Parts

PROCEDURE under which resellers are authorized to apply their traditional percentage markups to manufacturers' prices on new automotive parts has been announced by the OPS.

The reseller is permitted to use the same percentage markups over his cost to various classes of customers of the commodities he



One of the longest serpentine brick walls in the world is nearing completion at the test track of Ford Motor Co. in Dearborn, Mich. Eight feet high and more than a mile in length, the wall will conceal testing of new models and add to the beauty of the countryside, Ford officials said. Another reason for the undulating design was economy, since the wall is one brick thick and requires no bracing.

sells as he used in the pre-Korean period from April 1 to June 24, 1950. This new base period was established by the regulation.

If the manufacturer did not use a list price, resellers determine ceilings by adding percentage markup used in the base period to the current legal cost as stated on invoices from the manufacturer or jobber. If a reseller cannot use either method, he may apply to the nearest OPS office.

James A. Ayers, Cadillac-Oldsmobile dealer of Chattanooga, is one of the principal speakers at the convention of the Kentucky Automobile Dealers Association Sept. 16-18 at Gilbertsville, Ky.

He is Tennessee NADA director and a past president of the Tennes-

see Automotive Association.

"Antique" Ceilings Lifted

Price controls have been removed from "antique" used cars by the OPS. The order applies to 1926 and older models. Such cars are usually sold as antiques and have a greater value than the oldest models listed in the automobile guide books used to set ceiling prices on used cars under the federal regulations.

It's Later Than You Think

Be Ready For The Winter Trade . . .

"SCHOFIELD" FRESH AIR HEATERS

- ORIGINAL EQUIPMENT QUALITY
- LOW INVENTORY
- 3 Heaters 95% Coverage

One heater to fit 1949-1951 Fords and Chevrolets

One heater to fit 1949-1951 6 cyl. Chrysler Products

One heater fits all trucks—Also 95% of all older passenger cars—6 and 12 volt available.

DEALERS: Ask your jobber for "Schofield" Heaters. They are available! Distributors in Georgia, Tennessee, Alabama, Mississippi and Florida:

Write

VAL-VIN-HED Silencer

Stops clicking noise, Lubricates valve mechanism. Provides protection against moisture condensation. Chevrolet list \$2.95; Buick \$3.50. Place an order with your jobber today.

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ATLANTA, — GEORGIA



It was summer for the men but strictly winter for the battery when Willard Storage Battery Co. conducted demonstration tests for its Heavy Duty DeLuxe line. In the test shown above, the battery started three cars simultaneously while it was encased in a 300-pound block of ice. Another battery encased in ice cranked a car for a total of 17 minutes. A third was baked in an oven at 200° F. before it went into action.

Sales Down, Service Up, NADA Survey Reveals

New-car deliveries were down 16 per cent in the second quarter of 1951, compared with the comparable period last year, but total service business showed a gain of 10.4 per cent and parts and accessories sales were up eight per cent for the period.

These and many other interesting highlights of dealer operations were included in the second-quarter business management survey conducted by the National Automobile Dealers Association.

Dollar sales volume was down substantially from that achieved in the first quarter but held at about the same level as was reached in the second quarter last year.

Used-car gross profit, which had followed the upward trend in prices in an almost unbroken line from the time of our entry into the Korean war, reached a high point shortly after the turn of the year and then broke abruptly downward in the second quarter.

Unit sales of used cars and trucks were down slightly, averaging .6 per cent under last year. Dollar sales increased about 16 per cent.

Because of continuing increases in operating costs, the serviceabsorption average, which reached 63.8 per cent in the first quarter, dropped back to 61.5 per cent, substantially where it was at the end of June, 1950.

Average gross profit on service business stood at 32.5 per cent of sales.

"Following so closely behind the period of abnormal activity which was experienced in the first quarter, the results of the second three months were probably disappointing to many dealers," a statement from NADA said. "Judged by other standards, however, and considering the clouded outlook at the beginning of the year, they were not too bad."





"Boss" Kettering Hits 75 And Keeps Rolling Along

ONE of the "greats" in the automotive industry, Charles F. Kettering, was honored with a civic celebration in Dayton, Ohio, August 29, his 75th birthday.

Now retired, though still holding the status of research consultant with General Motors Corp., Kettering has a long list of automotive inventions to his credit, headed by the self-starter.

The former head of the General Motors Research Laboratories and vice-president of the corporation was born on a farm in Ashland County, Ohio. After teaching school for a while, he decided to study electrical engineering at the Ohio State University. Hampered by recurring trouble with his eyes and the necessity of supporting himself through college, he did not receive his degree in mechanical electrical engineering until 1904, when he was 28.

He immediately joined National Cash Register Co. and was assigned the job of developing an elec-



Mr. Kettering

tric drive for the cash register, a job experts said could not be done because of the size of the motor that would be required. He produced his first model within a year. The same principle is used today.

In 1909 Kettering organized the Dayton Engineering Laboratories Co., later abbreviated to "Delco." Among the first problems studied by the firm was the automotive ignition system. A system of controlling relays instead of vibrators greatly increased the driving range with a single set of dry cells.

While working on an electrical generator suitable for automobile lighting, Kettering became convinced that such a generator could be converted into an electric motor, having a relatively high torque so it could be used for cranking as well as for battery charging.

ing.
Cadillac accepted the starter design and in 1912 installed 12,000 self-starters on its cars. Public acceptance of the starter was instantaneous and it has been credited with doing more to make the owner-driven car a reality than any other single invention.

Kettering also discovered that, for a given fuel, the tendency of the engine to knock increased as the compression ratio was increased. This marked the beginning of the study of anti-knock fuels.

An independent electric generator for use in isolated farm houses, schools and other buildings not served by a central power station was placed on the market by Kettering in 1914.

Since 1920 the GM genius' activities have been closely allied with the General Motors Research Laboratories. He believes that research should be a cooperative enterprise involving the integrated talents of all sorts of engineers and technicians.

A description of the inventions and discoveries that have come out of the research organization under Kettering's leadership would fill several thick volumes. A list of Kettering's civic, educational and scientific activities during his "off duty" hours would also be an impressive one.



Fits Pins On 34 Car And Truck Models

One Reamer does the work of five ordinary reamers! Its greater expension range series you money. Model 85 AS Dual Spiral Expension Reamer plus 3 extra sets of blades fits piston pins and king botts in 34 makes of cars and trucks. Chrome steel blades can be reshorp-ened several times. Mandrel is in 100%, contact against the entire length of blode, are every expension ronge. No flexing or springing—on bell mouthing. Exclusive dual spiral write for Reamer Bulletin, Lempco Products, Inc., 5490 Dunham Read, Bedford, Ohio.

LEMPCO EQUIPMENT
... It pays its own way

The Stork Bought This Automobile!

When Pundmann Motor Co. of St. Charles, Mo., advertised that it would allow \$10 for each child on the purchase of a used car, chances are the officials of the firm hadn't realized just how much Mr. Stork could do toward providing transportation.

Mrs. William Davis took one look at the ad, bundled her 11 children into the family car, drove to Pundmann Motor Co. and selected a \$100 car. With so many children to ride around, it was nice to get a second car free, she commented.

SPONTANE STEAM CLEANER

ALL SPONTANE STEAM CLEANERS ARE NOW EQUIPPED WITH HYDRO-THERM FLOW

Your jobber will be glad to supply additional information.

HALLS, INCORPORATED
110 Pear Street, S. E. Atlante, Georgie

Plymouth Cites Advantages Of Its Pressurized Cooling

NFORMATION on its pressurized cooling system was contained in a recent service bulletin from the Plymouth Division of Chrysler Corp. The service bulletin stated, in part:

The average motorist has long been accustomed to operating his car with the temperature indicator pointing to the middle of the gauge to the so-called "normal" position, with very little fluctua-

A cooling system with a pressure-vent radiator cap has a much wider temperature operating range. It is perfectly safe and normal for Plymouth cars equipped with the pressure-vent radiator cap to operate within this wider range, with the gauge needle pointing from just to the right of the "cold" position to just to the left of the "hot" position.

Water confined under pressure greater than atmospheric pressure will require a higher temperature to boil.

Severe Driving Conditions

Under severe driving conditions, such as high-load hill climbing; heavy bumper - to - bumper, stop-and-go driving; high-altitude driving or driving where outside temperatures are above 100° F., the gauge will read near the "hot" mark. This is normal.

The normal temperature operating range of the current type of cooling system with the pressure-vent radiator cap is greater than on previous models. The cooling system with the pressure-vent radiator cap has been designed to improve general performance and engine life by setting higher and more efficient operating temperatures and by decreasing the possibility of loss of coolant.

During severe driving conditions it is normal for the needle to point very close to the "hot" mark. Of course, if the needle suddenly goes beyond the "hot" mark, the cooling system should be checked.

NOTE: It is normal for a small amount of water to be lost through the overflow pipe, if the radiator cap is removed when the temperature gauge reads near the "hot" mark. When the cap is re-

moved under these conditions, the system is restored to atmospheric pressure and boiling may momentarily take place.

L-M Promotes Luster

A. W. Luster has been promoted to manager of the administrative department of the Lincoln-Mercury Southern region. He succeeds William L. Brenner, promoted to sales manager of the Memphis, Tenn., district.

Cleveland Names Gokay

Election of O. P. Gokay as treasurer has been announced by The Cleveland Graphite Bronze Co. He will head the finance division and also will retain the position of comptroller, held since 1947.





Belden

Automotive WIRE



Right now, with motorists more conscious of tire life, you and your dealers can make tire repairs a big-volume, neat-profit operation! Be sure to stock and promete Buxco's Double Cushion patch assortment in the handy self display carton . . it contains all the sizes your dealers need most, gives them a full line of the quick, reliable, tire repairs that make more money and more friends for him — and repeats sales for you, too.

DOLLAR FOR DOLLAR YOUR BEST BET'S BUXCOI FOR OVER 20 YEARS THE FINEST IN MOLDED RUBBER TIRE REPAIR PATCHES AND OTHER AUTOMOTIVE RUBBER PRODUCTSI

THE BUXBAUM COMPANY CANTON 1.



"Aero-Seal" CLAMPS

Worm Drive Never Works Loose



BREEZE M A R K

BREEZE CORPORATIONS, INC.

29 South Sixth St., Newark 7, N. J.

FACTS!

1. In this issue over 300 advertisers are placing their announcements before the jobbbers, dealers, garages and service stations of the nineteen Southern and Southwestern states.

2. The 28,000 copies of this issue reach over 5,500 towns and cities in the South. This means a very thorough coverage of the small town trade as well as that of the larger cities.

3. This is very important to advertisers, jobbers and distributors because over 71% of the cars in the South are owned and operated in and around towns of 25,000 population or less.

Southern Automotive Journal

Linmar WATER PUMPS

ANOTHER AUTOMATIC PRODUCT SOLD BY YOUR AUTOMOTIVE JOBBER

WRITE FOR CATALOG S-5

TOLERANCES . . , As low as .0002" on critical operations. BEARINGS . . . All bearing-type pumps equipped with notionally known and advertised bearings and lifetime labelication.

SEALS . . . Bellows type, of synthetic rubber impervious to oil and reinferced to prevent cracking. SHAFTS . . . All grease-type pumps equipped with long-wearing, precision-ground shafts.

wearing, precision-ground shafts.

GUARANTEE... Every Linmar Water Pump is guaranteed fully against defects in material and workmanship and to fit exactly the car for which it is designated.

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Limmar Division automatic still Products, INC. - canton s, BHID

A Secretial Section to the Advantage Industry for Over 20 Years

Night or day, the showroom and office building of Mutual Motors, Cadillac-Oldsmobile, Columbia, S. C., catches the eye. These facilities represent the completion of a building program that began six years ago when the Cadillac contract was signed, Charles C. Vogell, president and general manager, said. The service department, the first unit in the permanent facilities, was opened officially two years ago.

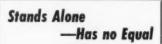
Hudson Will Build Bomber Sections

HUDSON Motor Car Co. announced late last month it had received an order from Glenn L. Martin Co. to engineer, tool and manufacture rear fuselage and tail sections for the twin-jet B-57 Canberra Night Intruder bomber.

Approximately 250,000 square feet of floor space at the plants in Detroit will be used for this and a previous aircraft order from Wright Aeronautical Corp. Tooling for the Martin order will begin immediately, according to A. E. Barit, president of Hudson.

Aircraft work will not interfere with automobile production schedules permitted by the government, Barit also stated.

The Canberra was originally designed and built in England as a high-altitude radar bomber. The U. S. model is a Night Intruder version of the bomber.





The original liquid metallic preparation for repairing crecked engine blocks, cylinders and velve ports.

MILLER MANUFACTURING CO.
Dept. SA Comden S, N. J.





What about the guy who decides to "get a few more miles" out of the old set? Well...there are two ways to sell him: (1) rescue him from a jam like Bill is doing, above or (2) tell him about the bonus mileage with safety he gets with RiteSet LONG LASTING LINING!

RiteSet's new ELEC-TREAT compounding and curing process is the latest thing...makes standard lining heavy-duty-produces high friction with low wear. Gives your customers many extra miles at no extra cost!

RiteSet's mileage bonns with safety makes a big hit. Customers bring in friends... friends bring in friends...sometimes even enemies bring in friends. In the meantime, you'll be cashing blue chips. Install RiteSet on your next job and see for yourself!

RITESET WAREHOUSES ATLANTA BOSTON CHICAGO DETROIT HOUSTON MINNEAPOLIS PHILADELPHIA RICHMOND SAN FRANCISCO SEATTLE



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"Now get it straight...
NOT replacement pilots,
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REPLACEMENT PARTS"

Pilot offers you a quality line of hydraulic brake cylinders, parts, repair kits and universal joints. Write for complete catalog.



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PARTS
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Certified to excel



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MEET ALL YOUR NEEDS standard or special with PLANET the complete line of — BRASS FITTINGS - COPPER TUBING GREASE FITTINGS - FUEL LINES AIR AND GREASE LINE ACCESSORIES

... and a sporkling line of fast-moving accessories. ATTRACTIVE PACKAGES BALANCED ASSORTMENTS



PLANET METAL PROD. CORP.

General Manager Walter C. Mallory of the Florida Automobile Dealers Association, representing the Florida Inter-Industry Highway Safety Committee, is shown presenting a check to Lieut. C. E. "Red" Taylor of the Florida Highway Patrol. Taylor was one of eight patrolmen over the country who were given \$650 fellowships by the Automotive Safety Foundation to attend the fall course in traffic police administration at Northwestern University. Others in the photo are (l. to r.): Standing, Col. H. N. Kirkman, director of the Florida Department of Public Safety; seated, State Comptroller C. M. Gay, Secretary of State R. A. Gray, Governor Fuller Warren and Attorney General Richard W. Ervin.

July Car Registrations Approximate 450,000

JULY registrations will total approximately 450,000 new passenger cars, continuing the downward trend in registrations since May, R. L. Polk & Co., Detroit statisticians for the automotive industry, reported August 23 on the basis of incomplete reports.

In June 454,665 passenger cars were registered. The total for the first six months of the year was 2.808,586, compared with 2,289,-937 for the first six months of 1950.

Preliminary figures indicated that about 90,000 new trucks were registered in July, slightly less than the June total of 91,512 new trucks.

J. A. O'Malley to Address New Mexico Convention

A. O'MALLEY, general sales manager, Chrysler Division, Chrysler Corp., will be one of the principal speakers at the convention of the New Mexico Automotive Dealers Association, Inc., to be held Sept. 24-25 in Silver City, N. M.

An old-fashioned open-pit barbecue and special events for the ladies will highlight the entertainment, Executive Secretary William Randolph reported.

Superior Names Virginian

Smith-Moore Body Co., Richmond, Va., has been appointed distributor in Virginia for Superior Coach Corp., Lima, Ohio, President John H. Smith announced last month.





INSTANT FIRING! EVEN BURNING!



this improved Monkey Grip product. Two sizes fill all needs, cut inventory in half, and increase your profits.

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TRY IT AT OUR EXPENSE!

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EVENLY. Your patch sales will sizzle upward with

Monkey Grip developed the BLUNT DIAMOND SHAPE and the FILLER TAB—and now is first in FASTER FIRING "SIZZIE" BOARD. Keep your sales

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SEND TODAY!

FREE TRIAL PATCH We'll send you FREE, and without obligation, a sample SIZZLE PATCH. Write for it today.

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NO MORE CARBON SCRAPING

*DUNK AND CRIER BASKET INCLUDED

Nothing Decarbonizes and Cleans CARBURETORS, FUEL PUMPS. PARTS Cike ..

U. S. PAT. #2318842° GUNK DUNK BENCH Cerburetor end Parts Cleaning Kit New 6½ gal. size deep "Vapor-catcher" design pail.

New - Improved -More Potent*

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If it doesn't bear the Genuine GUNK trademark, it may be a partly diluted imitation — and will not give you the Safety and Advan-tages of Genuine GUNK and should be flatly refused.

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"All-In-One" Trans. & Drive Line Repair Kit

For Most Chev. Cars & Pickups, Most GMC Pickups. As Advertised in the Saturday Evening Post Sold Nationally By Leading Automotive Wholesalers

NATIONAL MACHINE WORKS, INC.

Write or wire for full information. Dept S.

MANUAL CHOKE CONVERSION KITS

Spring Loaded Device

Our patented spring loaded device assures proper car-buretor mixture, giving quicker, easier starting. Installs without removing carburetor. Fully guaranteed.

Also Migrs. of omplete Line of Universal ood and Choke Controls.



Superior Screw & Mfg. Co., Inc. 1227 W. Henderson Chicago, III.

The Future of Car Prices? Ford Discusses the Angles

For almost a month, we have been asked what pricing action Ford Motor Co. will take when, as, and if OPS finally moves on some form of much needed relief from constantly increasing costs borne by the automotive industry since the start of the war in Korea, more than a year ago," Ernest R. Breech, executive vice-president of Ford Motor Co., said late last month.

The statement was made while the "Big Three" were asking for an increase of possibly nine to ten per cent on the price of their products. It was expected that OPS would grant increases under the new law which permits manufacturers to add proved increases in production costs to the baseperiod price of articles made.

"While the new ceilings are being worked out in Washington," Breech said, "we at Ford are in

this position:

"1. Our customers are today paying no more for our cars than they did 19 months ago—except for the across-the-board token cost relief of 3.5 per cent granted the industry by OPS on March 2, 1951.

"2. During this same period (January 1, 1950, to July 26, 1951) for our passenger cars alone, the cost of materials has increased \$98,000,000 a year, wages and salaries have increased \$43,000,000 a year—a total of \$141,000,000.

"This reflects no increased cost resulting from NPA cuts in production to help meet defense requirements for vital materials...

"3. As long ago as October, 1950, before any government restrictions were in effect, these cost increases had reached a point where a sound business practice dictated that we recover some of them at least. We decided to hold the price line at that time, and consequent-

ly—unlike most businesses—were caught in the price freeze on December 1, 1950.

"4. Ford Motor Co. will maintain its policy of selling at the lowest possible price consistent with the costs of its products."

Minnesota Mining Opens Warehouse at Dallas

MINNESOTA Mining & Manufacturing Co. has opened a regional sales office and warehouse at 1221 Dragon St., Dallas, Texas, to serve Texas and neighboring states.

Walter F. Gruetzman is regional office manager. Ray Paulson is sales manager for abrasives and related products and Fred Richardson is sales manager for cellophane tapes.

Clayton Hits 50,000 Mark

The 50,000th Kerrick steamcleaning machine came off the line at Clayton Manufacturing Co., El Monte, Calif., last month. The firm was founded in 1931 with five employees.



VINEN SPARK PLUG CLEANER & TESTER

CONSISTENT PERFORMANCE AT LOWEST COST!

VIXEN gives you a choice of spark plug cleaner only at \$5.75, or spark plug tester only at \$18, or combination cleaner and tester at \$24.75, or Vixen Deluxe in hammertone grey or white enamel at \$31.50.

You Can Pay Much More But You Cannot Give Better Service!

See your jobber or write to — EDMUND J. WUDEL MFG. CO.

6082 E. FERGUSON DR., LOS ANGELES 22, CALIF.

338 Peachtree St., Atlanta, Georgia 1006 W. Main St., Oklahoma City, Okla.





THEY'RE GUARANTEED!

Dept. D. The LAKE AUTO RADIATOR Mig. Co.



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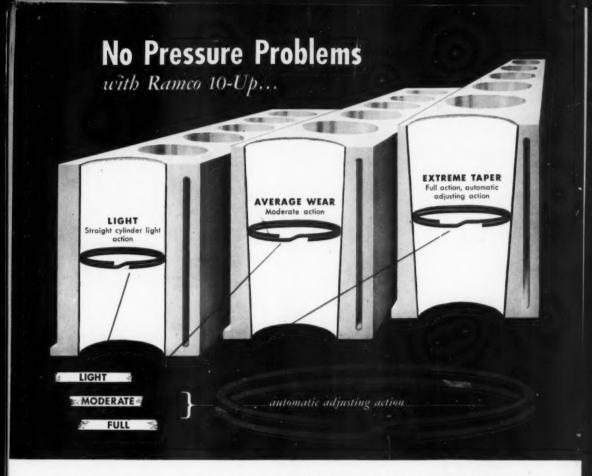
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